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A SURVEY OF VOCATIONAL EDUCATION IN THE PROVINCE
OF SASKATCHEWAN FROM 1950 TO 1967 TOGETHER WITH
A STUDY OF CURRENT OPINIONS IN THIS FIELD

by



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A THESIS

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UNIVERSITY OF ALBERTA

FACULTY OF GRADUATE STUDIES

The undersigned certify that they have read, and recommend to the Faculty of Graduate Studies for acceptance, a thesis entitled "A Survey of Vocational Education in the Province of Saskatchewan from 1950 to 1967 together with a study of Current Opinions in this Field" submitted by Stanley Michael Klopoushak in partial fulfilment of the requirements for the degree of Master of Education.

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ABSTRACT

The purpose of this study was to make a survey of vocational education in Saskatchewan from 1950 to 1967, to summarize some of the current opinions in this field and to assess the vocational education program in Saskatchewan. Information for the comparison portion of this study was obtained from programs and courses of study of the Department of Education in each province. Information for the assessment portion was obtained from a questionnaire study distributed among selected principals and instructors of shopwork, home economics, business education (commercial), and vocational agriculture.

Because a previous study had been done for the period up to 1950, the survey covered the period from 1950 to 1967. The objective in this case was to update the information up to 1967.

The results from the comparison of the programs indicated that the program of Alberta was more advanced and more extensive. The basic aims and objectives were similar but the other factors were not. Alberta had made specific provision for articulation of programs. They offered a large number of courses with a greater variety in areas. Alberta had three times as many schools offering vocational education with three times as many students enrolled in these programs, yet, the total population of Alberta was approximately one and one-half times that of Saskatchewan.

The progress in this field was also reflected in the expenditure

of money. Alberta had spent two and a half times as much money as Saskatchewan did on vocational education. The expenditure resulted in Alberta providing almost three times as many student places as Saskatchewan. The questionnaire results pointed out that the Saskatchewan vocational program had suffered because there was a lack of facilities, equipment and staff. Furthermore, most schools, especially those in the Units, lacked the necessary enrollment to expand their facilities. More centralization was needed to warrant expenditure on increased facilities. It was also felt that the program lacked variety and depth. Because of this, students were not given an adequate background in any program that they wished to pursue in later life.

There was a majority opinion favoring the idea that vocational education should be part of general education. The idea was to give students a broad experience and to arouse their interests so they could be better prepared to absorb more education rather than prepare them for a specific vocation. It was felt that these subjects should be accepted as credits for entrance into university or technical institutes, thus making these courses available to all students, regardless of their future plans.

Many respondents believed that a change of attitude was required so that people would regard vocational education courses on a par with academic subjects. It was stated that these subjects were not only for the low ability student, but should be offered to all students. If all students could select these courses they would no longer be considered "second-rate", and students would choose them from the point of view of interest rather than be forced to take them.

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CHAPTER I

INTRODUCTION

With the passing of the Technical and Vocational Assistance Act in December 1960, extensive opportunities presented themselves whereby provinces could receive financial aid from the federal government "for 75 per cent of the cost of new buildings and equipment until a limit based on population is reached and thereafter at 50 per cent of the cost for the life of the agreement (to 1967)."¹

A huge building program has taken place in every province across Canada as a result of this Act. The federal government has encouraged vocational education through this aid and has disseminated literature to educate people on the need and importance of vocational education. This action has encouraged the provinces to reassess their present position in education and to take a long hard look at what is being done in their own provinces. One example of such an assessment is the report to the Ontario Legislature.² Activities of this kind have been going on in other provinces with varying degrees of depth.

From the literature it would appear that whenever there was federal government stimulation, activity in vocational education in

¹Dean H. Goard, "Current Developments in Canadian Technical and Vocational Education," Phi Delta Kappan (April, 1965), p. 396.

²J. R. Simonet, Chairman, Report of the Select Committee on Manpower Training, Ontario Legislative Assembly (Toronto: February, 1963).

the provinces increased. The question is in what way and to what extent Saskatchewan has availed itself of the opportunities which presented themselves when outside help was available and what progress has been made in the field of vocational education in the Province of Saskatchewan.

I. THE PROBLEM

Statement of the Problem

The general purpose of this study was to trace the development of vocational education in the Province of Saskatchewan from 1950 to 1967 and on the basis of the questionnaire prepared for this study, to make an assessment of the program. Originally the study was to be a detailed description of what has been done in Saskatchewan since 1950. It became apparent that a survey would be inadequate and it was felt that more value would be derived from the study if the program were examined in the light of other programs and the opinions expressed by teachers in the schools where the actual program was being followed.

The following specific purposes established the limits of this study:

1. To examine the kinds of vocational education programs that are being offered in the schools of the Province of Saskatchewan.
2. To determine the extent to which the province has used federal aid.
3. To determine specific trends in vocational education in

Saskatchewan. The study will report on the trends in the following areas: (a) how federal aid has influenced vocational education in Saskatchewan; (b) the types of programs being offered; (c) the enrollment in vocational education; (d) kinds of schools.

4. To draw conclusions regarding vocational education in Saskatchewan.

5. To list recommendations and suggestions for improvement in Saskatchewan schools as expressed by principals and teachers in a questionnaire study.

Delimitation of the Study

This study will be concerned with a survey of the highlights of the development of vocational education in Saskatchewan from 1950 to 1967 as outlined in the Acts of the Provincial Legislature of Saskatchewan. It will record reactions and suggestions of principals and teachers regarding the adequacy of the present program. It will explore the various aspects of vocational education in the publicly-supported vocational schools only, i.e. technical schools, technical collegiate institutes, composite high schools and other schools whose educational programs are controlled by the Department of Education in Saskatchewan. For the purpose of this study, it will be considered "operationally" that the questions asked on the questionnaire are valid to obtain information required by the study.

II. DEFINITIONS OF TERMS USED

Vocational Education

Carter V. Good defines vocational education as:

(It is) a program of education below college grade organized to prepare the learner for entrance into a particular chosen vocation or to upgrade employed workers: includes such divisions as trade and industrial education, technical education, agricultural education, distributive education, and home economics education.³

Another definition states:

Vocational Education becomes that part of the total experience of the individual whereby he learns successfully to carry on a gainful occupation. In addition to the broad definition of vocational education just given, it must be recognized that it is also used in a narrower sense in which it implies the existence of a series of controlled and organized experiences used to train any person or persons for a given employment.⁴

Although there is not complete unanimity regarding the definition of vocational education, there is a common thread which runs through most definitions, especially when one thinks of vocational education in broad terms. For the purposes of this study, the broad definition is accepted and includes the area of industrial arts which provides a basis for further training in a chosen field.

Composite High School

This study accepts the definition of a composite high school used by the Saskatchewan Department of Education.

³Carter V. Good, Dictionary of Education (Toronto: McGraw-Hill Publishing Company, 1959), p. 603.

⁴Charles A. Prosser and Thos. H. Quigley, Vocational Education in a Democracy (Toronto: General Publishing Co. Ltd., 1957), p. 2.

. . . it is not to be regarded as a vocational school. . . . The composite high school offers a well-balanced program for all students with the academic subjects and the technical subjects nicely blended in accordance with students' future plans.⁵

III. NEED FOR THE STUDY

That there is a need for vocational and technical education in our present society is evident from the changes that have taken place throughout the world in the last few decades. During World War II people with technical and mechanical skills were in great demand. In Canada, and elsewhere, training programs to train people for war needs were organized. These programs were continued after the war under the Dominion-Provincial agreements. Composite high schools were developed in the hope that more high school students would be able to receive the necessary education both in the academic and the vocational fields. As the Honourable Michael Starr, the former Minister of Labour, said:

It is no longer enough for us to have only a small proportion of our young people complete high school mainly with the thought of university in mind, and still a smaller proportion complete a technical or vocational program at the secondary school level, and have the remainder find their life's vocation in the best way they can. The pace of technological change is too rapid and competition for world markets is too intense to allow us to squander our precious asset.⁶

Another indication of the interest in and concern with vocational and technical education is the statement of W. R. Dymond, Assistant

⁵Province of Saskatchewan, Department of Education, A Guide to Technical and Vocational Courses for High School and Special Classes, Bulletin D (Regina: The Queen's Printer, 1957), p. 3.

⁶C. Ross Ford, "Why - Technical Education - What is it?" (address to Western Canada Conference on Teacher Education and Certification, May 23, 1963), p. 6. (Mimeographed.)

Deputy Minister of Labour, Ottawa:

The task of those responsible for education and training is to find ways and means of meeting the challenges of a constantly changing economy. This task suggests, to me at least, a number of points of emphasis in our institutions, policies and programs in the field of vocational and technical education and manpower development generally.⁷

The report on the Canadian Conference on Education states that "Throughout the provinces today there is evidence of considerable activity: expansion of training facilities, teacher training, and recruitment of teachers. Yet nowhere is there that sense of national emergency which the times warrant".⁸

In view of these statements, one senses a great urgency to update our training facilities and to provide adequate programs in vocational education. Before this can be carried out properly, extensive research, especially critical analyses and experimental studies must be undertaken to serve as a guide for action.

There has been one similar study made in Saskatchewan.⁹ It dealt with the development of vocational education in the North West Territories from 1870-1905 and in Saskatchewan from 1905-1950.

The present study would update the historical survey of voca-

⁷W. R. Dymond, Assistant Deputy Minister of Labour, Ottawa, "Manpower Development and Training in Canada" (talk to Provincial Deputy Ministers of Labour and Education, September, 1963), p. 1. (Mimeographed.)

⁸Arthur V. Pigott, Education and Employment (Ottawa: Canadian Conference on Education, 1961), p. 38.

⁹George B. Jameson, "Some Aspects of the Development of Vocational Education in the North West Territories from 1870-1905, and Saskatchewan from 1905-1950" (unpublished Master's thesis, University of Saskatchewan, Saskatoon, 1955).

tional education in Saskatchewan and would determine the direction in which the Province is moving. It would concentrate the information in a single source and be available as a reference on recent activity in vocational education. A study of this nature is needed to focus attention on the position of vocational education in Saskatchewan in relation to other programs and to determine whether the Saskatchewan program is keeping pace with some of the leading programs in this field. Furthermore, for any program to be effective, a continual reassessment is necessary so that proper guidelines can be determined and thus provide direction for change within the Province.

With little done in the field of research in Saskatchewan and with much activity going on in vocational education throughout Canada, it would appear that such a study is both timely and necessary.

CHAPTER II

REVIEW OF THE LITERATURE

The literature was reviewed to determine what research has been done in the field of vocational education in Saskatchewan, to find out what programs have been and are in existence in Saskatchewan, to find out the kind of program that is followed in Alberta in order to compare it with that of Saskatchewan, and to determine some specific aspects of the adequacy of the present Saskatchewan program in the light of the Alberta program. The actual comparison of the Saskatchewan and Alberta programs will be made in Chapter IV.

Furthermore, a review of the literature was made in order to determine what has been going on in some of the leading areas of the world and including the States of Illinois and Michigan as having typical programs of the United States, and to document some of the contemporary thought in vocational education.

Two other purposes established limits to this study, namely, to list recommendations and suggestions for improvements as expressed by principals and teachers in the questionnaire study and to draw conclusions regarding the status of vocational education in Saskatchewan. The first of these will be dealt with in Chapter V under the analysis and summary of the results of the questionnaire. The second one will be included in Chapter VI under summary and conclusions after all the information has been collected.

I. RESEARCH IN THE FIELD OF VOCATIONAL EDUCATION IN SASKATCHEWAN

Very little has been done in the way of studies of vocational education in Saskatchewan. In his thesis, Jameson recorded the significant events in the growth of vocational education in the areas of Agriculture Instruction, Shopwork, Commercial Work, and Home Economics as they applied to the North West Territories and the province of Saskatchewan up to 1950.¹

A study by Langley dealt with the programs that were authorized for use in the North West Territories and Saskatchewan.² References were made to the vocational education courses conducted up to 1931.

A study by Morgenroth contains a chapter on vocational education in Saskatoon, Saskatchewan from 1913 to 1947.³ This chapter deals with the purposes and powers of the vocational education committee and outlines the grants for vocational classes conducted under the Dominion-Provincial Youth Training Program.

Glendenning has written a thesis dealing with federal financial

¹George B. Jameson, "Some Aspects of the Development of Vocational Education in the North West Territories from 1870-1905, and Saskatchewan from 1905-1950" (unpublished Master's thesis, University of Saskatchewan, Saskatoon, 1955).

²Gerald James Langley, "The Programmes of Study Authorized for Use in the North West Territories to 1905 and in the Province of Saskatchewan to 1931 and the Textbooks Prescribed in Connection Therewith" (unpublished Master's thesis, University of Saskatchewan, Saskatoon, 1944).

³Kaspar George Morgenroth, "The Development of the Organization and Administration of the Saskatoon School System" (unpublished Master's thesis, University of Saskatchewan, Saskatoon, 1949), Chapter X.

support of vocational education in Canada.⁴ In it he outlines the help that the provinces received under the federal Acts and Agreements dealing with vocational education for a period of approximately four decades.

II. VOCATIONAL EDUCATION PROGRAMS IN SASKATCHEWAN

In his thesis, Jameson⁵ outlined the vocational courses as they existed in Saskatchewan in 1950. The information on the programs for that year was used in this study.

The Programme of Studies for Vocational Schools (Tentative) remained in effect in 1950. This programme provided for a four-year vocational education high school course in industrial, home economics, and commercial fields, culminating in a grade twelve diploma. In this outline agriculture was offered as an optional subject in grade eleven. The science courses in grades nine and ten had sections dealing with agriculture. Short courses were also offered at the University of Saskatchewan.

The industrial course was made up of General Shop Work, Drafting, Electricity, Farm Mechanics, Motor Mechanics, Sheet Metal and Woodwork.

The commercial course permitted grade nine and ten students to take a maximum of three subjects each of two hours per week for a maximum of three credits. The subjects had to be selected from Short-

⁴Donald Ernest Malcolm Glendenning, "The Impact of Federal Financial Support on Vocational Education in Canada" (unpublished Doctoral dissertation, Indiana University, Bloomington, Indiana, 1964). (Micro-film.)

⁵Jameson, op. cit.

hand, Business Essentials, Accounting and Typewriting. In grades eleven and twelve, five subjects could be chosen from Shorthand, Typewriting, Accounting, Office Practice with related Business Correspondence, Office Practice and Business Economics, each requiring two and one half hours per week for a maximum of five credits.

Home Economics was offered in each of the high school grades. The "A" and "B" courses, as outlined in 1946 were retained in 1950. Course "A" was designed for small high schools which lacked space and equipment. Course "B" was intended for the three technical schools, the collegiates and the composite high schools which had the equipment and teachers qualified to teach the course.

The three technical schools at Regina, Saskatoon, and Moose Jaw offered slightly different courses. They included academic, shop, commercial, home economics, plus special vocational short courses varying in length from a few weeks to one year.

In Saskatoon, at the end of grade ten, students were expected to choose an academic course, or a combined academic-industrial course or a special shop course. The combined academic-industrial course permitted students to enter Normal School, enter employment, or enroll for an extra year with further training in mathematics, science and a foreign language. Upon completion of the fifth year a student would qualify for University entrance. The special shop courses in Carpentry, Motor Mechanics, Electricity, and Welding with associated Drafting, were designed for students who found it necessary to seek employment before the end of four years.

Students could choose the combined academic-commercial-household

science course in grade nine. At the end of grade nine they had to choose between commercial and household science courses. Boys were directed into the commercial field and girls chose either commercial subjects or home economics for further study.

In 1944 The Larger School Units Act was passed. With the grouping of several school districts into larger units it became possible to broaden the courses in commercial work, shopwork, and home economics. These schools, which offered academic courses as well, became known as Composite High Schools. Many vocational departments were added to existing schools and new facilities were provided in other areas. The vocational courses in these schools were the same as outlined above. Enrollments increased greatly where such schools were established.

It is encouraging to note that in every composite high school the student enrolment has increased. The diversified programme increases the appeal and holding power of the students who might never enter high school or enter only to drop out within the first two years.⁶

Because of the limitations of space and equipment in the new composite high schools, a basic shopwork course was designed to be used in these schools. The Tentative Programme of Studies in Basic Shopwork for the Composite High Schools which was authorized for use in August, 1950 outlined a course which was intended to be basic to the work of the farm and the trades related thereto. Grade nine and ten students were required to take four types of shop courses in order to

⁶Province of Saskatchewan, Annual Education Report, 1948-1949 (Regina: The Queen's Printer, 1949), p. 27.

give them a broad background for more specialized work in grades eleven and twelve. Drafting was compulsory and the other three could be selected from Woodwork, Metal Work, Motor Mechanics, Electricity or Printing.

The commercial course for the composite high schools as outlined in Commercial and Home Economics Courses for Technical and Composite High Schools offered one or two courses in grades nine and ten. These were to be selected from Shorthand, Typewriting, Business Essentials or Accounting. Grades eleven and twelve were required to take one, two or three courses selected from Shorthand, Typewriting, Accounting, or Business Correspondence with related Office Practice.

The home economics course remained much the same as had been outlined earlier. The two types of courses, "A" and "B", were still offered.

In 1952 the Programme of Studies for the High School, Bulletin D was authorized for use. Very little change was made in this new program as seen in Table I.

In Table II all first courses taken in grades nine or ten are identified by the numeral "I", all second courses taken in grade eleven are identified by the numeral "II" and all third courses taken in grade twelve are identified by the numeral "III". In the three credit courses provided for grades eleven and twelve, one subject becomes a major and the other a related minor.

TABLE I
ORGANIZATION OF COURSES⁷

Grades IX and X

Field	Subjects	Credits Allowed
1. Commercial	1 or 2 (in grade X - 3)	1 or 2
2. Home Economics	1	1
3. Basic Shopwork	1 or 2	1 or 2

Grades XI and XII

1. Commercial	1 or 2 or 3	1 or 2 or 3
2. Home Economics	1 or 2	1 or 2
3. Basic Shopwork	1 or 2 or 3	1 or 2 or 3

⁷Province of Saskatchewan, Department of Education, Programme of Studies for the High School, Bulletin D (Regina: The Queen's Printer, 1952), p. 5. (Hereinafter referred to as Bulletin D, 1952.)

TABLE II
ORGANIZATION AND GRADE CREDIT ALLOCATION
FOR VOCATIONAL SUBJECTS⁸

Commercial			Home Economics		Basic Shopwork	
Grade	Subject	Credits	Subject	Credits	Subject	Credits
IX	Business Essentials	1	Home Economics	1	Drafting I	1
	Typewriting I	1			Woodwork I	1
X	Typewriting II	1	Home Economics	1	Metalwork I	1
	Shorthand I	1			Motor Mechanics I	1
	Accounting I	1				
XI	Typewriting III	1	Home Economics	1	Drafting II	1
	Shorthand II	1			Woodwork II	1
	Accounting II	1	Course "A"	2	Metalwork II	1
	Business Correspondence (1952-53 only)	$\frac{1}{2}$			Motor Mechanics II	1
	*Business Economics	1			Welding	
			Course "B"			
XII	Typewriting IV	1	Home Economics	1	Drafting III	1
	Shorthand III	1			Woodwork III	1
	Accounting III	1	Course "A"	2	Metalwork III	1
					Motor Mechanics III	1
			Course "B"			

Course A (in Home Economics) is for schools with limited equipment for practical work and for students who are interested in an introductory course only. It is a one-credit course in each of grades eleven and twelve. Course B is for schools with established homemaking room and well-qualified instructors. It is a two-credit course in each of the senior grades.

*As soon as a general economics course is prepared by the Department, the business economics will be discontinued.

⁸Ibid., pp. 7, 40, 55.

TABLE III
SUMMARY OF COURSE ORGANIZATION FOR SHOPWORK⁹

Grade	Fields of Work	Credits	Time per week
IX	2	2	4 hrs. per week
	or 2	1	2 hrs. per week
X	2	2	4 hrs. per week
	or 2	1	2 hrs. per week
XI	1 or 2	2	4 hrs. per week
	or 2	3	6 hrs. per week
	or 1	1	2 hrs. per week
XII	1 or 2	2	4 hrs. per week
	or 2	3	6 hrs. per week
	or 1	1	2 hrs. per week

Note:

- (1) In grades 9 and 10, 2 different shop subjects should be selected each year. Drafting is a required subject. No special grade allocation is given for the different subjects.
- (2) The same shop subjects carried in grade eleven will be carried in grade twelve.
- (3) Prerequisite training shall be required for progression from one grade level to the next. Thus, before a grade eleven student is allowed to enroll in Metalwork II he must have successfully completed Metalwork I.

⁹Ibid., p. 56.

Effective July 1, 1957 a new curriculum guide for vocational education was introduced in Saskatchewan secondary schools.¹⁰ The guide outlined the four technical subject areas available to high school students grades IX to XII.

The general organization of courses in the 1957 curriculum was almost identical to the Programme in 1952 and as outlined in Table I, page 14. The difference was that in 1957 vocational agriculture was added as a vocational area of study in each of the four high school grades. Grades nine and ten could take one subject each in vocational agriculture for one credit, while grades eleven and twelve could take two subjects each for two credits in each grade.

Table IV shows the extent of the technical subject areas.

In the field of Basic Shopwork grade nine students were required to take any two of the subjects listed in Table IV. Successful completion of any two courses would entitle them to two full credits. If a student could not take two shop credits, he would get a single credit by taking a minimum of seventy-two hours per year in any one shop field or by taking thirty-six hours per year in each of two fields.

In grade ten, two credit shop students were expected to train, if possible, in two different shop fields from those taken in grade nine, one-credit students would take either a minimum of seventy-two hours per year in one of these selected fields or thirty-six hours per year in each of two fields.

¹⁰Province of Saskatchewan, Department of Education, A Guide to Technical and Vocational Courses for High School and Special Classes, Bulletin D (Regina: The Queen's Printer, 1957). Hereinafter referred to as Bulletin D, 1957.)

TABLE IV

SUMMARY OF VOCATIONAL EDUCATION COURSES AND CREDIT ALLOCATION¹¹

Grade	IX	X	XI	XII
Field				
Home Economics	Home Economics (1)	Home Economics (1)	Home (1 or 2) Economics	Home (1 or 2) Economics
Commercial	Business Essentials(1)	Recordkeeping-1	Bookkeeping-1	Bookkeeping-1
	Typewriting-1	Typewriting-1	Typewriting with Office Practice-1 Shorthand-1 and Transcription	Typewriting with Office Practice-1 Shorthand-1 and Transcription
Basic Shopwork	Drafting I Woodwork I Metalwork I Motor Mechanics I Electricity I		Drafting II Woodwork II Metalwork II Motor Mechanics II Electricity II Welding II	Drafting III Woodwork III Metalwork III Motor Mechanics III Electricity III Welding II
Vocational Agriculture	Vocational Agriculture -1 Farm Shopwork-1	Vocational Agriculture -1 Farm Shopwork-1	Vocational Agriculture (1 or 2) Farm Shopwork-1	Vocational Agriculture (1 or 2) Farm Shopwork-1

Note: Numbers after subjects designate number of credits for that subject.

¹¹Ibid., p. 4 (and sections under different courses).

Specialization in one shop field was encouraged in grades eleven and twelve, where either one- or two-credit courses could be offered. Two shop credits required either four hours per week in one shop field or two hours per week in each of two fields. Three-credit shops could be taken if special permission was received from the Department. Then, the student chose two shop fields but doubled his time in one of them, which was then considered his major.

In grades nine and ten, two different shop subjects should be selected each year. Drafting is a required subject. No special grade allocation is given for the different subjects.

The same shop subjects carried in grade eleven should be carried again in grade twelve.

Prerequisite training shall be required for progression from one grade level to the next.¹²

Automation and other forms of technology have advanced so rapidly in the last decade that the whole concept of training has to be reassessed. Training programs must be designed in such a way so as to give the people entering the work world, the training which will be necessary for tomorrow's society. The changes that are taking place must be properly analyzed so that programs can be planned. Vocational education can make a contribution in our technological age, providing its programs will not be obsolete before students enter the work world.

Because of the great changes taking place in technology, the Saskatchewan Department of Education is making an effort to improve both the quality and the quantity of vocational education in the province. The two Technical Institutes at Moose Jaw and Saskatoon offer training for adults in various technologies, the objective is to provide

¹²Ibid., pp. 56, 57.

more of this type of education for students at the secondary school level. The objective as stated by the Department is:

In designing the curriculum for the secondary vocational school, the Department wishes to provide the type of education and training that will be most appropriate for an increasingly complex and demanding social and economic order. The plan outlined in this draft sets forth the preliminary thinking of the Department in this regard. The approach is an entirely different one from what has been employed previously. It is still in the developmental stage. What is contained in this bulletin should be regarded as tentative.¹³

The Preliminary Draft also stated that the existing programs in the composite and technical high schools would continue as they are for the next few years. Revisions would gradually be introduced to bring the two approaches more closely together.

The plan named eight major fields upon which a new secondary vocational curriculum may be built, but gave details of only five of the instructional areas, namely, architecture and building construction, mechanical, electrical-electronics, agriculture, and business and commerce. The plan also stated that in order to achieve the purpose of the new program, school boards would have to cooperate to provide regional vocational schools. Nine such possible regions in the Province were suggested. The Government would undertake the entire construction of these schools in consultation with local authorities.

By the end of 1967, it appeared that the idea of regional vocational schools had been dropped. No new schools of this kind were planned. Nevertheless, several comprehensive schools had been built

¹³Province of Saskatchewan, Department of Education, The Technical-Vocational Branch, Secondary Vocational Education Outline of Program (preliminary draft only, Regina: March 18, 1964), preface. (Mimeographed.)

and were providing vocational training in various fields. Others were near completion or in the planning stages. Tentative courses had been authorized for Division IV (grades X, XI and XII) in technical vocational subjects, business education, and vocational agriculture. A tentative home economics course¹⁴ for grade ten was authorized in 1968; the grade eleven and twelve courses would be introduced in successive years. The technical vocational curriculum¹⁵ consisted of courses in the mechanical field, the construction field, electrical-electronics field, and the drafting trade. Each of the first three areas were divided into technologies and trade. The following program patterns were available to students in grade ten:

- (a) Time - 20% Students take one of construction, mechanics, or electricity technology throughout the year.
- (b) Time - 30% Students explore the three areas of technology for 18 weeks and then specialize in one for the remainder of the year.
- (c) Time - 30% Students take drafting and explore any two of the three technology areas for the remainder of the year.¹⁶

The student's performance in a technology would determine whether he would continue in that technology or consider a trade in the area that he had chosen.

¹⁴Province of Saskatchewan, Department of Education, Home Economics 10 Management for Living, Tentative (Regina: July, 1968). (Mimeographed.) (Hereinafter referred to as Home Economics 10.)

¹⁵Province of Saskatchewan, Department of Education, Division IV Technical Vocational Curriculum (Regina: 1967). (Mimeographed.) (There were separate courses of study for each of the following: mechanical field, construction field, electrical-electronics, and drafting trade.)

¹⁶Ibid., p. 1. (Mechanical field.)

The Business Education Curriculum Guide¹⁷ outlined three courses; namely, the basic business education course, the clerical business course and the special one-year business education course. The first course was for the average student who wished to continue in further studies or go to work after grade twelve. The second course was for students who were unable to cope with the basic course. The one-year course was designed for students after grade eleven or those who were eighteen years of age. The course prepared them for work.

The Vocational Agriculture Curriculum¹⁸ outlined courses in the agricultural field. The program contained the following sections: agricultural technology, farm mechanics and agricultural machinery. The different courses could be used as credits for a high school diploma. Students could take all three courses if they were going into farming, the school of agriculture, the technical institute or agribusiness, but only one if they were proceeding to university.

In September 1967 the Division III (grades VII, VIII, and IX) program was officially authorized. This was the third phase in the implementation of the plan for reorganization of instruction in Saskatchewan schools.

The Curriculum Guide for Division III provided for a phase-in period over several years and both the newly-developed courses in the new guide and the previous courses were authorized for use in the

¹⁷Province of Saskatchewan, Department of Education, Business Education Curriculum Guide (Regina: July 1, 1968).

¹⁸Province of Saskatchewan, Department of Education, Division IV Vocational Agriculture Curriculum (Regina: March, 1967).

schools. In the Industrial Arts program, the multiple activity idea was suggested in order to provide students varied experiences.

To provide a wide exploratory experience, nine basic areas may be considered. The basic areas are divided into units, each a minimum of 15 hours. There are a possible 16 units, from 7 to 9 weeks in length. The minimum number of areas covered depends upon equipment, facilities and instructors, but it is hoped that a minimum of 4 units will be selected from at least 3 basic areas each school year. By the end of two years in Division III a student should have covered from 7 to 10 units.¹⁹

Because of the varied differences from school to school, each school was allowed to adapt its program to best fit the individual circumstances. A suggested organization of teaching units is found in Table V.

TABLE V
ORGANIZATION OF TEACHING UNITS IN DIVISION III

Grade VIII	Grade IX ²⁰
Wood 1	Wood 2
Metals 1	Metals 2
Electricity-Electronics 1	Electricity-Electronics 2
Graphic Communications 1 (Drafting)	Graphic Communications 2 (Drafting)
Additional Areas	
Graphic Arts 1 and 2 ³	Power Mechanics 1 & 2
Plastics 1	-or- Plastics 1
Electronic Computer 1 & 2	Photography 1

¹⁹Province of Saskatchewan, Department of Education, Curriculum Guide for Division III (Regina: The Queen's Printer, July, 1967), p. 257.

²⁰Ibid., p. 258.

III. VOCATIONAL EDUCATION PROGRAMS IN THE PROVINCE OF ALBERTA

Some of the experiences of Alberta provide additional background information concerning the general field of vocational education. Alberta has experienced a revolution in the field of vocational education. In the past decade extensive changes have taken place in order to provide "programs capable of developing the full potential of those students whose educational goal does not include graduation from a university. This includes 80% of our students."²¹

These students require exploratory experiences responsive to their needs and which are capable of arousing and holding their interest and participation. The vocational programs, which have been developed for Alberta's high schools, have been designed to fill this need for courses suited to students varying widely in interests and abilities.

Several factors were responsible for this development. First, research conducted by the Federal Government's Department of Labour indicated that there was a dire need for skilled technicians and tradesmen in order for Canada to maintain and improve her position in the industrial world. Second, was the lack of adequate training facilities necessary to develop the required skilled manpower. Third, and most important from an educational point of view, was the necessity to reduce the number of "drop-outs" from our schools through the offering of educational programs which would better prepare our students for entry into the business and industrial world.²²

Extensive facilities were provided as a result of the Technical and Vocational Training Agreement. Since the termination of this agreement in 1966 "the province of Alberta has continued to provide financial assistance comparable to that provided during the term of the agreement, to school Boards who wish to offer vocational programs in

²¹R. H. Cunningham, High School Inspector of Vocational Education, Vocational Education Follow-Up 1967 (Edmonton: Department of Education, 1967), p. 1. (Mimeographed.)

²²Ibid., p. 2.

their high schools".²³

The vocational programs are a part of the regular high school curriculum but are offered only in schools with sufficient enrollment to support a broad program of studies. Students may complete requirements for a high school diploma by taking various amounts of vocational education subjects depending on whether they plan to enter university, enter a technical institute, go into apprenticeship or enter the business world. There was also provision for cross-over from academic to vocational programs and vice versa. The vocational courses constitute 35 to 40 credits out of a minimum of 100 necessary for a high school diploma. A number of the vocational programs were articulated with similar programs at the technical institutes and received credit for these programs at the institutes. Similarly vocational courses were articulated with the Alberta Apprenticeship Programs.

Alberta had 25 high schools in the cities and the larger towns which offered a wide selection of programs, plus 27 other schools which offered vocational business education programs but no industrial vocational courses.

Two vocational secondary schools in Calgary and two in Edmonton had either been built or extended and specifically designed to offer pre-employment, non-credit programs. There were also seven new high schools in various stages of planning, which would include complete vocational facilities.

School boards were encouraged through special operating grants

²³Ibid.

to accept students from other counties, so as to make programs available to students from rural and more sparsely settled areas of the province.

There are high school programs in the following vocational areas:

Agricultural Mechanics	Food Preparation
Appliance Servicing	Forestry
Auto Body Repair	Graphic Arts
Automotives	Industrial Chemistry
Beauty Culture	Lithography
Building Construction	Machine Shop
Commercial Art	Performing Arts
Drafting	Pipe Trades
Electricity	Sheet Metal
Electronics	Welding

In the business education field, programs had been developed in:

Stenographic	Bookkeeping
Secretarial	Merchandising

The schools generally offered a minimum of six vocational programs in addition to business education, with some offering as many as fourteen.

The results of these programs were very encouraging. The demand for these graduates far outnumbered the supply. Employers had been contacting the schools and the Department for these graduates. Furthermore, students were staying in school much longer, while others had been returning to school after an absence of a year or so to enroll in vocational as well as academic courses.²⁴

The vocational programs are gaining in popularity as evidenced by the increasing number of schools offering the programs, the expansion of facilities that have taken place in most of the schools that have been in operation for one or more years and

²⁴Ibid. (Information gleaned from pages 2 to 7).

finally, by the increasing enrolment in the courses.²⁵

A new development in the cities of Calgary and Edmonton was the building of schools which were intended for students who had been unsuccessful in school and were two or three grades behind other students of the same age. These schools would offer these students both practical and academic studies. They would prepare students to move back into regular high school programs or develop saleable skills in the field of service occupations. Funds for the facilities and equipment for these programs were obtained from the provincial and federal governments under the Technical and Vocational Training Assistance Act, which is no longer in effect.

In order to prepare vocational teachers and vocational guidance counsellors, courses were offered by the University of Alberta's Faculty of Education. Many teachers had received generous bursaries which enabled them to take one year of teacher education leading to a B.Ed. degree in Vocational Education.²⁶

IV. ACTIVITY IN THE FIELD OF VOCATIONAL EDUCATION

IN CANADA AND ELSEWHERE

Vocational education came to Canada quite early. Phillips stated that practical courses were part of the curriculum as early as 1855.²⁷ At McGill University a course in applied science was offered

²⁵Ibid., p. 8.

²⁶Ibid., (gleaned from pages 10 and 11).

²⁷Charles E. Phillips, The Development of Education in Canada (Toronto: W. J. Gage, 1957), p. 207.

in that year. From then on it was a matter of evolution. To begin with, night classes provided training and it wasn't until the beginning of the twentieth century that day-school classes in vocational training came into being. "Toronto in 1901 added day classes to the evening technical classes organized ten years before, and in 1901 established a technical school".²⁸

The first federal aid came when the Canadian government, by the Agricultural Aid Act of 1912 and the Agricultural Instruction Act of 1913 made available to the provinces sums of money increasing annually and amounting in all to \$11,400,000 by 1924.²⁹ The Technical Education Act of 1919 provided ten million dollars over a period of ten years for any form of vocational or technical education. In 1929 the time limit was extended since only Ontario had used its full allotment. By 1937 Manitoba was the only province which had not used its allotment.³⁰ The Vocational Education Act of 1931 promised \$750,000 a year for fifteen years, but its operation was postponed by the depression.³¹

The Vocational Training Coordination Act of 1942 paved the way for a variety of vocational education activities. Under this and subsequent legislation, \$30,000,000 was made available to the provinces for vocational secondary schools, including \$10,000,000 for capital expenditures between 1945 and 1952 and \$2,000,000 a year for mainten-

²⁸Ibid., p. 208.

²⁹Ibid., pp. 344-345.

³⁰Canada, Department of Labour, Annual Report (Ottawa: The Queen's Printer, 1938), p. 66.

³¹Phillips, op. cit., p. 345.

ance and operating costs.³²

Four agreements between the provinces and the Federal Government had been signed during the years following the Coordination Act of 1942. The first of these, "The Vocational Schools Assistance Agreement", was extended until 1957 when the Vocational and Technical Training Agreement No. 2 provided a total of \$25,000,000 during the seven-year period 1957-1964. This amount was divided between the provinces on the basis of the 15 - 19 age group - to be used for capital and annual operating allotments".³³ In 1960 all the agreements in the field of vocational education were grouped under the Technical and Vocational Training Assistance Act. The Act provided for a federal contribution of seventy-five percent of the provincial government capital expenditures for technical and vocational training facilities up until March 31, 1963 and fifty percent thereafter without the limit of a quota allotment. The Federal Government would also contribute 75 percent of the cost of training the unemployed, 50 percent of the cost of training all other persons who left the regular secondary schools, as well as 50 percent of the cost of training technical and vocational teachers, supervisors and administrators.³⁴ Two agreements operated under the Assistance Act of 1960, namely, The Technical and Vocational Agreement, and The Apprenticeship

³²Ibid.

³³Canada, Department of Labour, "History of Federal Aid", Technical and Vocational Education in Canada, Vol. 1, No. 1, 1962, p. 9. (Hereinafter referred to as Technical and Vocational Education.)

³⁴Canada, Department of Labour, Annual Report (Ottawa: The Queen's Printer, 1961), p. 76.

Training Agreement. All provinces signed the new Technical and Vocational Training Agreement and it was in effect from April 1, 1961 to March 31, 1967.³⁵ Under this agreement ten different programs were in operation; each province received its share as provided under the agreement.

In December 1963, Parliament amended the Act to extend the period of federal sharing at the 75 percent rate. To implement the changes that were made in the Act, amendments to the Technical and Vocational Training Agreement were brought about. These amendments authorized federal sharing of 75 percent in capital expenditures on training facilities until federal payments reached \$430 for each person age 15 - 19 (inclusive) according to the 1961 census and 50 percent thereafter until the Agreement expired. The amendments also provided for 75 percent federal sharing in training the unemployed and 75 percent in the provincial contribution to industry's expenditures for approved training programs.³⁶

Under the impetus of federal aid, great advances have taken place in the field of vocational education throughout Canada. By the end of 1966, "five and a half years after the passing of the Technical and Vocational Training Assistance Act, federal approval had been given for new construction and additions or alterations to 978 technical and vocational high schools, institutes of technology and trade schools across Canada. These new schools and additions had a planned accommoda-

³⁵Ibid., p. 76.

³⁶Ibid., pp. 16-18.

tion for 399,249 additional students."³⁷

Saskatchewan had an approved expenditure of \$42,902,339 for building and equipment. As a result 11,834 new student places were provided. On the other hand Alberta's expenditure amounted to \$129,935,667 on building and equipment projects and provided 36,022 new student places.³⁸

Ontario and Quebec led the provinces in the amount of approved expenditure under the Assistance Act of 1960, followed by Alberta, British Columbia, and Saskatchewan in that order.³⁹ On the basis of the June 1, 1966 population estimates by the Dominion Bureau of Statistics, the per capita expenditure of each of the above provinces is shown in Table VI.

Vocational Education in the U.S.S.R. has received much attention. Their idea is that students must know about industry and production and that the general elementary-secondary schools should give the young people a solid background to all vocations. Their education provides for a correlation of all subjects with the polytechnic courses beginning in the first grade. Changes in the curriculum are brought in from time to time to keep the program as up-to-date as possible.

The new curriculum reforms call for eight years of compulsory elementary education and three years of optional study in grades

³⁷Canada, Department of Manpower and Immigration, "Building for Tomorrow," Technical and Vocational Education in Canada, Issue No. 10, (Fall-Winter, 1966-67), p. 50.

³⁸Ibid., pp. 51-52.

³⁹Ibid.

TABLE VI
TOTAL AND PER CAPITA EXPENDITURE

	Expenditure ⁴⁰	Estimated Population ⁴¹	Per Capita Expenditure
Ontario	\$726,451,543	6,895,000	\$105.36
Quebec	\$236,476,112	5,744,000	47.17
Alberta	\$129,935,667	1,464,000	88.75
British Columbia	\$ 80,219,776	1,862,000	43.08
Saskatchewan	\$ 42,902,339	954,000	44.97

9, 10, and 11. These reforms have increased the compulsory education by 1 year and will add one year to the upper grades, making a total of eleven years for complete elementary-secondary general education.

The basic change in implementing the new curriculum reforms is the dual character of the general schools. All students, upon graduating from the 11 - year program are expected to have basic academic workers in either industry or agriculture.⁴²

The hope is that students will receive an education with a dual purpose - academic and polytechnic.

In the U.S.A. the vocational program is partly supported by federal funds and is under public supervision or control in the various States. The program provides instruction for students who are in regular school attendance and those who are out of school.

⁴⁰Ibid., pp. 50-51.

⁴¹Canada, Dominion Bureau of Statistics, Canada Year Book 1967 (Ottawa: The Queen's Printer, 1967), p. 1262.

⁴²United States, Department of Health, Education and Welfare, Soviet Education Programs, Bulletin 1960, No. 17 (Washington: U.S. Government Printing Office, 1962), pp. 127, 131.

. The present occupational categories of vocational education consist of agriculture, trades and industries, home economics, distribution, practical nursing and related health occupations, the fishing industry, and the highly skilled technical occupations.⁴³

The Report further dealt with each of the above categories separately and outlined in general terms the programs and regulations governing each category. Generally speaking programs for in-school youth were varied and flexible. Many States provided a number of plans and a school could choose one of these and adapt it to meet its needs. In several of the categories a student could enroll in a school-work program. Such a student spent some time on the job and his occupational instruction was given both on the job and in school. Home economics education programs were based on the needs of the individual and included classwork and supervised projects in the student's home. In the practical nursing area of work, much of the work was arranged as preemployment training programs. The content of the programs varied depending on the particular occupation and the regulations it had set up. The fishery occupations were carried on in the United States where there was a need. They could be of a longer or short-term duration and covered many related subjects in their courses, such as navigation, diesel engines, radio, etc.

The Report further stated that the vocational enrollment had increased annually by 2.3 percent since 1918 and in 1960-61, 13 percent of the 15 - 19 year age group was being served by this program. This

⁴³Education for A Changing World of Work, A Report of the Panel of Consultants on Vocational Education, OE Pub. No. 80021 (Washington: U. S. Government Printing Office, 1962), p. 29.

in itself shows the extent to which the program had been developed, despite the fact that more schools required vocational education programs and that programs had to be changed because of technical advances.⁴⁴

V. PROGRAMS IN THE STATES OF ILLINOIS AND MICHIGAN

Vocational education programs in the State of Illinois vary from one place to another but sufficient similarity exists so that a common program of what is happening in the area of vocational education is evident. The State of Illinois was chosen because it had a program which was quite well advanced and was somewhat typical of programs in several areas of the United States.

Vocational education came early to the United States. In 1917 the Smith-Hughes Act was passed. It brought federal support of vocational education programs conducted by the states as an integral part of public education.⁴⁵ Subsequent acts extended federal support to aid states in developing occupational programs in various fields. The most recent of these acts, the V.E. Act of 1963⁴⁶ provided for occupational training in any field below the professional level for secondary students, post-secondary students, adults and persons with special needs. It also provided for area vocational center construction and ancilliary services such as vocational guidance, research and experimen-

⁴⁴Ibid., pp. 108-109.

⁴⁵State of Illinois Board of Vocational Education and Rehabilitation, Vocational Education in Illinois, Annual Report, July 1, 1966 to June 30, 1967, Bulletin No. 213 (Springfield, 1967), p. 2.

⁴⁶Ibid., p. 3.

tation, work study and teacher training.

According to the Annual Report⁴⁷ the new vocational education program was committed to provision of occupational training for high school students, post-secondary students, adults and people with special needs, formation of area vocational centers to pool resources and provide broader programs in depth, meeting manpower needs in communities, state and nation, improvement of vocational education through supportive services and research and experimentation, and provision of work-study program to aid vocational students who needed funds to stay in school.

In the insert to the Annual Report,⁴⁸ Table 2 outlined the types of programs in existence at the secondary school level. These were as follows (enrollments given in brackets): agriculture (17,213), health (622), homemaking - useful (55,673), home economics - gainful (695), distribution and marketing (3,189), office (24,232), technical (4), and trades and industry (10,581). Table 7 of the same report listed vocational/technical programs which were in existence under the above-mentioned types of programs. Out of the one hundred sixty-four programs listed, secondary school students were enrolled in one hundred thirty-four of these. The remaining programs (including those offered to secondary students) were offered to post-secondary and adult students as well as to students with special needs. As an example of the varied offerings, under the health program there were eighteen different occupations

⁴⁷Ibid., p. 4.

⁴⁸Ibid., opposite p. 12.

listed. Some of these were dental assistant, dental hygienist, dental laboratory technician, medical services, histology technician, medical laboratory assistant, nurse associate degree, practical nurse, nurses' aide, hospital food service supervisor, inhalatory therapy technician, medical X-ray technician, optician assistant, surgical technician, occupational therapy assistant, physical therapy assistant, and other health occupations. Different occupations were listed under each of the other types of programs.

Some of the things that were in store for the State of Illinois in the task ahead⁴⁹ were to provide facilities, programs, and instruction which would insure economic and social adjustment within the framework of American institutions and society for all people. Every school must gear itself to provide an adequate occupational education program to meet the needs of all its students. Toward this end state-sponsored and federally-assisted area vocational centers and the junior college system were developed. It was expected that 40 to 45 Area Secondary Centers would be established in the state by 1975. They would be located within convenient transporting distance of all secondary students in the state. A broad program with training ranging from general service skills to special preparation in highly developed new fields would be provided. In addition, programs and supporting services would be available for those who had special needs whether from academic, physical or socio-economic handicaps. It was intended that several schools would pool resources to establish a comprehensive program, thus

⁴⁹Ibid., pp. 19-23 (resumé of these pages).

reducing duplication of facilities, equipment or personnel. The State Board encouraged this action by offering higher reimbursements to support area schools rather than single district schools. Financial assistance was also given to area secondary centers to support construction and renovation of facilities and to purchase instructional equipment.

The secondary school program was followed by the junior college system with courses of study that went beyond the high school program and into the more technical programs. It was expected that future programs would emphasize individualized occupational experiences which would lead to entry into and advancement within employment. The program would cater to individual needs and to an individual's potential employment.

The above resumé points out a definite plan which carried an individual through high school and beyond or until he entered employment. After that he could enroll in an adult program to keep up his training level so as to adjust to the changing needs of industry.

Programs in the State of Michigan were quite similar to those of Illinois. Using the broad areas of vocational education as guides, the Detroit Public School system organized the numerous occupations into home economics and four clusters to include the other areas. The occupations in each cluster included similar knowledge, skills, manipulative skills and attitude requirements. The areas of grouping were Energy and Propulsion, Materials and Processes, Visual Communications,

Personal Services and Home Economics.⁵⁰ To take care of these areas the Detroit High Schools provided courses which followed broad lines of student life interest. There were courses that were preparatory for business, office work and distributive education, as well as courses that were preparatory for work of a technical or vocational nature. Another group was one that led to preparation for professional work such as law, teaching, dentistry, etc.⁵¹ It is interesting to note that each area offered a large variety of courses. As an example the industrial education area offered 41 different courses that a student could choose as an elective towards a high school diploma. Some of the courses were offered only in certain high schools.⁵²

In the schools of the Saginaw Public School system a similar situation existed:

A diversified program is offered to most effectively reach both the in-school youth and our out-of-school adults in exploring and developing interests and aptitudes, followed by technical education and training which is required for participation and advancement in today's highly technical business-labor-industry world of work. Programs must be flexible to meet the many needs of all enrolled.⁵³

Programs that were offered seemed to be quite extensive and covered areas similar to those mentioned above in the Detroit Public

⁵⁰Detroit Public Schools, Vocational Education (Fall, 1967), Subject Enrolment Report, p. 1. (Mimeographed.)

⁵¹The Board of Education of the City of Detroit, Youth Education in Detroit, A Circular of Information, 1965, p. 9.

⁵²Ibid., p. 23.

⁵³Saginaw Public Schools, Vocational Education Department, The Doorway to a Better Tomorrow, 1966-67 Report of the Vocational and Adult Education, p. 3.

Schools.

Exploratory and advanced exploratory programs are offered in the secondary schools, grades 7-12, to provide basic experiences so vital to boys and girls along with regular academic subjects. This area includes courses in Industrial Arts and Homemaking, as well as numerous business education subjects, where indications of aptitudes and interests may be explored after appropriate guidance and counselling.

Cooperative Occupational Training for high school students provides perhaps the most perfect example of vocational education at work in our three high schools. After pre-vocational courses in one of three distinct areas of training, a boy or girl may be placed in an on-the-job situation on a half-time basis as a senior, with appropriate credit. The three areas are Office Training, Distributive Education, and Trade and Industry.

Boys interested in and showing an aptitude for industrial training may enroll in one of the curriculums at the Technical High School. Curriculums based on families of occupations are available; namely, Cast Metals, Tool and Die Design, Electricity and Electronics, Manufacturing, Machine Shop, Drafting, Metal Fabricating, and Power Mechanics.⁵⁴

Apprenticeship Training was offered beyond high school, for young men who wished to acquire complete training to become skilled tradesmen. Together with this there were vocational programs for adults keyed closely to the in-school programs so as to provide needed training and further education for securing work or promotions. There were Evening High School programs, as well as courses and programs for special groups.

The Ann Arbor Public Schools in Michigan offered similar programs. The secondary school programs included home economics, business education, and industrial education as well as the cooperative occupational training. The latter was designed to prepare youth for entry into the world of work.

The home economics program included classes in boys' foods,

⁵⁴Ibid.

commercial foods, clothing, home decoration, foods, child development and personal development. Over 100 boys were enrolled in the vocational foods program.⁵⁵ In programs of business education and industrial education there were eight different classes offered in each.

VI. TRENDS IN VOCATIONAL EDUCATION IN SASKATCHEWAN

Influence of Federal Aid on Vocational Education in Saskatchewan

Vocational education as a part of day-school classes came to Canada in the early part of the 19th century. In 1901 Toronto added day classes to evening programs.⁵⁶ Shortly thereafter, in 1912, the first federal aid was extended to the provinces by the Agricultural Aid Act. From then on various acts and agreements were passed which helped provinces to start programs and to enlarge their vocational education programs. Throughout the years the following were signed:⁵⁷

- 1912 - Agricultural Aid Act
- 1913 - Agricultural Instruction Act
- 1919 - Technical Education Act
- 1931 - Vocational Education Act
- 1937 - Unemployment and Agriculture Assistance Act
- 1942 - Vocational Training Co-ordination Act
 - a. Re-establishment Training Agreement
 - b. Apprenticeship Training Agreement
 - c. Vocational Schools Assistance Agreement
 - d. Vocational Training Agreement
 - e. Vocational and Technical Training Agreement No. 2
 - f. Vocational Correspondence Courses Agreement
 - g. Special Vocational Training Projects Agreement
- 1961 - Technical and Vocational Training Assistance Act

⁵⁵Ann Arbor Public Schools, Department of Vocational Education, Annual Report, 1967-68, p. 6.

⁵⁶Phillips, op. cit., p. 208.

⁵⁷Glendenning, op. cit., p. 32.

- a. Technical and Vocational Training Agreement
- b. Apprenticeship Training Agreement

Federal grants to vocational education started with the Agri-cultural Instruction Act of 1913 when \$10,000,000 was provided to promote projects in agricultural training.

The Technical Education Act of 1919 appeared to give generous assistance to the provinces for vocational education. However, Saskatchewan was not able to benefit fully by this measure. Each year the province lost 75 per cent of the annual appropriation, under Section 8 of the Act. In addition to this, the graph of Figure I indicates the province earned each year only a small percentage of the remaining accumulated available money. In 1920 the province earned 2 per cent of the available grant; in 1922 and 1923 it earned 11 per cent. In all other years of the ten-year period covered by the Act, it earned less than one per cent of the money available.⁵⁸

The above Act was not renewed in 1929 but provinces were permitted to collect unclaimed allotments after that date. Saskatchewan was one of the provinces which had done so. In 1937 the Dominion Unemployment and Agricultural Assistance Act provided \$1,000,000 to train unemployed young people and the Youth Training Act of 1939 provided \$1,500,000 for the same purpose.

The Vocational Schools Assistance Agreement (1945-1955) provided \$25,000,000 over a ten-year period to reimburse provincial governments up to 50 per cent of their expenditures for capital or operating costs of vocational schools and programs.⁵⁹

This Act was extended until 1957 when the Vocational and Technical Training Agreement No. 2 provided a total of \$25,000,000 during the seven-year period 1957-1964. In December 1960, the Vocational Training Co-ordination Act was repealed and replaced by the Technical and Vocational Training Assistance Act.⁶⁰

⁵⁸Jameson, op. cit., p. 123.

⁵⁹Canada, Department of Labour, Technical and Vocational Education in Canada, Vol. 1, No. 1 (Summer '62), p. 9.

⁶⁰Ibid.

The Saskatchewan allotment for vocational high school training and the total for all vocational education grants from the federal government is given in Table VII.

TABLE VII⁶¹

FEDERAL ALLOTMENT TO VOCATIONAL HIGH SCHOOLS AND TOTAL
VOCATIONAL EDUCATION GRANTS TO SASKATCHEWAN

Year	Saskatchewan	Total
1961-62	\$186,400	\$1,454,445
1962-63	165,500	5,349,883
1963-64	165,500	3,719,078
1964-65	165,500	2,556,821
1965-66	165,500	2,898,586
1966-67	139,180	8,311,795

There is no doubt that federal aid was instrumental in providing the impetus for increased facilities for vocational education. Under the Technical and Vocational Training Assistance Act, to the end of 1966, Canada spent \$1,308,859,746 which would accommodate 399,249 additional students. Saskatchewan increased its student places by 11,834.⁶²

⁶¹Canada, Department of Manpower and Immigration, Progress Support Branch, Annual Actual Federal Expenditures for Vocational Training, T.I.S. No. 222-A. (Mimeographed.)

⁶²Canada, Department of Labour, op. cit., pp. 50, 51.

The trend has been one of increased federal aid for vocational education. This aid directly influenced the provinces in their building programs. From the limited beginnings of 1913 to the present time, it can be seen that whenever the federal government stepped in to help the provinces financially, there was more activity at the provincial level.

The Types of Programs Offered

Programs as they existed in the years prior to 1950 were outlined in the thesis by Jameson,⁶³ from where information for this section was gleaned.

In agriculture, the Special Agricultural Course, 1907, was offered to high school students for four months during the winter as a direct preparation for farm work. Only one high school had conducted this course. In 1912 and 1913 Acts of the Federal Government provided aid for agriculture. In 1915 the Special Agricultural Course was brought in as a modification of the course of 1907. It reduced the course to three months during December, January, and February. Students took instruction in reading and literature, composition, spelling, Canadian history, arithmetic, farm accounts and business correspondence. Under the Special Agricultural Course of 1917 the Department of Education made a grant of \$500 to any high school or collegiate institute making provision for a course in agriculture as outlined by the Department. Very few people took this course. Special regulations

⁶³Jameson, op. cit.

in 1918 introduced another Special Agricultural Course which was the same as the former one, but it brought in a course in Household Science as well.

In 1919 a special short course in agriculture was conducted in Moosomin Collegiate as an experiment. Twenty-seven students attended. It appears that this was the last time the course was offered. In 1920 the Regulations Governing Secondary Schools came into effect which included a course similar to that of 1918. This course remained in the schools until 1944. In 1946 it was omitted from the Programme of Studies.

In 1920 a three-year agriculture course was provided in a booklet called Vocational Courses for High Schools and Collegiate Institutes. Students who completed this course could enroll into the Normal School. In 1921 the agriculture course was revised extensively and in 1925 the three-year course was discontinued, possibly due to the discontinuance of the Federal subsidy. No records could be found that the course had been offered in any high school.

In 1928 winter high schools were provided for by an amendment to The Secondary Education Act but no districts took advantage of these. These provisions were repealed in 1930.

The next move came in 1938 with provision for an equipment grant for instruction of pupils above grade eight in agriculture. A few schools took advantage of the grant.

The Annual Education Report for 1945-46, stated that the Estevan and Oxbow Larger Units pooled resources and established a school at Outram which emphasized vocational agriculture. It operated

for only one year.

Although vocational agriculture had very little success, agriculture as a subject was offered most of the years from 1905-1950.

In 1950 it was offered as an optional subject in grade eleven.

In 1957, A Guide to Technical and Vocational Courses for High School and Special Classes outlined a course in vocational agriculture. It was offered in each of the grades nine to twelve. Students in each grade could take vocational agriculture and/or farm shopwork. Grade nine and ten students could earn two credits depending on future plans while grade eleven and twelve students could earn three credits. These regulations are in effect at the present time. (1968.)

Shopwork in the high schools began as manual training under the 1911 amendment to the Secondary Education Act of 1907. High school districts could provide manual training, domestic science and physical training. A 1913 amendment to the School Act provided for manual training, industrial training, domestic science and physical training. These regulations remained in effect for several years. Few schools went into shopwork because of the expenses involved. In 1916 it was reported that Regina, Prince Albert, Yorkton, and Swift Current were offering manual training and the next year Qu'Appelle, Saskatoon, and Humboldt were reported offering the course.

Industrial evening classes were being offered by 1913 in Moose Jaw and Saskatoon. Grants were available for these classes by an amendment to the School Grants Act in 1917. A practical course called the Industrial Work Course was outlined in the Vocational Courses for High Schools and Collegiate Institutes for 1920. It was a three-year

course dealing with wood and activities connected with it in the first year, sheet metal work in the second year, while the third year continued the work of the first two years plus lathe and forge work. Students from these courses could enter Normal School upon passing an examination in algebra or geometry. In 1921 industrial work was changed to "Wood and Metal Work" and in 1924 it again became industrial work. The content, though, remained the same until 1931.

Technical Institutes were established in 1931. Under Regulations and Courses of Study for Vocational Schools of that year, a three-year course included the following industrial courses: motor engineering, metal work, electricity, house carpentry and joinery, drafting and art. The course included academic subjects as well.

In 1937 a "General Course" was introduced for students who did not intend to go to university or normal school. These students could choose from a wide range of vocational subjects. In 1944 a four-year programme was drawn up which put the vocational subjects on par with the academic ones. Students could obtain a grade XII diploma by studying the "core" subjects and continue studying commercial, technical subjects and home economics for a fourth year. The industrial course was comprised of general shop work, drafting, electricity, farm mechanics, sheet metal and woodwork. This course remained in effect until 1952.

The Programme of Studies for the High School Bulletin D of 1952⁶⁴ outlined courses in the commercial field, basic shopwork and home economics for grades nine to twelve. This programme did not apply to

⁶⁴Bulletin D, 1952, p. 56.

the three technical schools in the province, namely, Saskatoon, Regina, and Moose Jaw. The basic shopwork included drafting, woodwork, metal-work, motor mechanics, and welding. A Guide to Technical and Vocational Courses for High School and Special Classes in 1957 added electricity to the 1952 programme.

With the advent of the new Division IV (grade X, XI, XII) reorganization, the Technical Vocational Curriculum was drawn up in 1967. This curriculum was printed in separate booklets for each of the following fields: Mechanical Field (mechanical technology, trades - automotive, machine shop, welding); Construction Field (construction technology, building construction trades); Drafting Trade; Electrical-Electronics (electrical-electronics technology, electrical and electronics trade).

As yet very few schools have the necessary accommodation or equipment to bring in the Division IV technical vocational curriculum. There appears to be a move in the direction of comprehensive schools which will be able to handle the above courses.

The trend in the field of shopwork seems to be one of slow evolution with stimulation from federal funds. The early offerings of manual training with activities in wood and sheet metal remained in effect until 1931. In that year industrial courses in motor engineering, metal work, electricity, house carpentry and joinery, drafting and art were outlined in the new programme. The 1944 course was quite similar. It had general shop, drafting, electricity, farm mechanics, machine shop, motor mechanics, sheet metal and woodwork. This course, with minor changes in 1952 and 1957 remained in effect until the present

time. The break with tradition is outlined in the 1967 Technical Vocational Curriculum. Modern up-to-date courses are outlined in several fields. The question that remains to be answered, is to what extent will these courses be adopted by the schools or specifically, will the present school set-up be able to adopt these extensive courses.

Commercial work was started in Saskatchewan shortly after the province was formed. In 1907 regulations provided for a two-year commercial course. In the first year the course consisted of bookkeeping, business papers, penmanship, typewriting and stenography. The second-year course had bookkeeping, business and business laws, negotiable paper, writing, stenography and typewriting. In 1918 Commercial Correspondence was added to the second year (grade X). After 1924 there was very little change in the first year content until 1931. The second year commercial was discontinued in 1922 and renewed in 1927 with slight modifications. This course remained in effect until 1931, when the new regulations omitted it entirely. Its place was taken by a three-year vocational course in commercial work which had been outlined in 1920 in a booklet called Vocational Courses in High Schools and Collegiate Institutes. The first year included bookkeeping and business papers, stenography, typewriting, business correspondence, arithmetic, rapid calculation, and office practice. The second year added commercial law and economics, while the third year extended the study of the subjects of the previous year. This course remained in effect, with minor changes, until 1931. In that year the commercial course requirements were as follows:

First year: English, history, mathematics, foreign language,

accountancy, stenography - shorthand and typing, penmanship, spelling.

Second year: English, history, mathematics, geography, health education, foreign language, accountancy, commercial law and economics, stenography - shorthand and typing, commercial correspondence and office practice, penmanship, spelling.

Third year: English, history, mathematics, foreign language, accountancy, commercial law and economics, stenography - shorthand and typing, commercial correspondence and office practice.

In 1936 business organization was offered as an option to commercial law and economics. It was a study of extractive industries, manufacturing, marketing of manufactured products, transportation, banking and insurance.

It appears that only the larger collegiates and technical institutes offered the commercial course. In 1938 a special grant to schools offering commercial work was made available and about twenty-five of the smaller schools offered partial or complete commercial courses.

In 1944, a four-year vocational high school course was offered in commercial work. Students could receive a grade twelve diploma in this field of study. The only academic requirements were literature, composition and history. The course included business practice, book-keeping and accountancy, shorthand, typewriting, business economics, and office practice.

In 1950 a tentative programme was outlined in Commercial and Home Economics Courses for Technical and Composite High Schools. Grade nine and ten students could take a maximum of three subjects for three credits chosen from shorthand, business essentials, accounting and typewriting. Grade eleven and twelve students could take a maximum of five subjects for a maximum of five credits chosen from shorthand,

typewriting, accounting, office practice with related business correspondence, office practice and business economics. The 1952 Programme of Studies for the High School Bulletin D⁶⁵ outlined courses for all high schools other than the three technical schools at Regina, Moose Jaw and Saskatoon. The subjects outlined were much the same as in the 1950 tentative programme with the exception that shorthand was postponed to grade ten while business correspondence was offered for one year more and office practice was excluded from the course. Business economics was to continue until a general economics course was prepared by the Department of Education. This course was in effect until 1957 when a new curriculum was introduced.⁶⁶ The following courses were offered: grade nine - typewriting, business essentials; grade ten - typewriting, shorthand, recordkeeping; grade eleven - typewriting with office practice, shorthand and transcription, bookkeeping; grade twelve - typewriting with office practice, shorthand and transcription, bookkeeping. A change was made from accountancy to recordkeeping in grade ten. This course, as well as business essentials, was to have a more general interest to all students. Office practice was added to typewriting in grades eleven and twelve. This addition was aimed at strengthening the typewriting course.

In 1967, the new Division IV curriculum guide was drawn up.⁶⁷

⁶⁵Ibid., p. 7.

⁶⁶Bulletin D, 1957, p. 31.

⁶⁷Province of Saskatchewan, Department of Education, Business Education (Regina: 1967). (Mimeographed.)

As was the case with other vocational areas, this was a tentative guide for the business education courses and designed for experimental use in the larger high schools. The hope was that the content and texts would be tested and revisions made, if necessary, before the program would be finally authorized for use throughout the province. The new program differed from the previous one in that it offered a broader range of subjects, hence the change in name from "Commercial Courses" to "Business Education". Also, the former three-subjects program (type-writing with office practice, shorthand, bookkeeping), were enlarged to permit a variety of program patterns and a special program for students in clerical practice was introduced. The program was updated to include the older courses and introduced those courses in keeping with modern office practices. The basic business education courses were bookkeeping, business organization and management, calculating machines and mathematics, communications, economics, law, merchandising, office procedures, shorthand and typewriting. The clerical business course included different levels of the following subjects: business records, calculating machines and mathematics, communications, consumer economics, distributive education, employee relations, office procedures, retailing and typewriting.

The basic education course prepared students for the matriculation level and/or for work after obtaining a grade twelve standing. The clerical business course was a three-year course for students unable to cope with the basic business education course. A special one-year business education course was also outlined. A prerequisite for this course was grade eleven or age 18. The course content was the

same as for regular students but because of maturity it was expected that they would be able to cover the work more quickly. The program was intended for students proceeding directly into employment, for students proceeding to further education in business after high school, for those unable to cope with the regular program, and for those who desired a special one-year course to go into business directly.

From the above resumé, it can be seen that the commercial course in the high school remained quite similar over the years. With the exception of a few changes in courses in the program, or the course content, the commercial course remained the same. The larger centres offered somewhat more extensive courses while the smaller centres offered bookkeeping and typewriting. The new course is still unproven and it remains to be seen to what extent it will be adopted throughout the province in the next few years.

Home economics started out as training in sewing and cooking in 1909 in Regina elementary schools. At about this time the Normal School in Regina gave instruction in this field. In 1913 the Course of Study for High Schools and Collegiate Institutes outlined a course in household science and in 1914 it appeared as an optional subject in the regulations. In 1915 Regina and Prince Albert, Blaine Lake, Kamsack and Forget Convent conducted classes in household science at the high school level. There was a lack of household science teachers and summer courses were held to prepare them for the program. Provincial grants were made available in 1919 to schools teaching the course. Evening classes and short courses were made available for a few years but little mention of the short course is made after 1923.

In 1920 the Vocational Courses for High Schools and Collegiate Institutes outlined a new course in home economics which stated that about one-half the time was to be spent on home economics and the other half on academic subjects. The course outlined instruction in food and its preparation, textiles, clothing and design, the family budget, the house - its care and decoration, sanitation, laundering, home nursing and the care of children. In 1921 the course was changed to include foods and cookery, household management, textiles and needlework, laundry, home nursing, dressmaking and millinery. In 1932 home nursing was dropped from the first year course and household management became home management. From here the content remained the same until 1944. The three-year course in home economics was taught mainly in Regina, Moose Jaw and Saskatoon.

In 1944 the Programme of Studies for Vocational Schools (Tentative) provided a four-year vocational high school course in home economics. Students could earn a grade twelve diploma after four years. The course included a study of foods and cookery, clothing and textiles, and home management. The course seemed to be slanted toward home-making rather than toward any post-secondary school vocation. Very few schools besides Regina, Moose Jaw and Saskatoon had the facilities to offer this program entirely.

The 1946 Programme of Studies for the High School, Bulletin I prescribed an "A" and a "B" course in grade nine. Bulletins 2, 3, 4 outlined the course for grades ten, eleven and twelve in the three successive years. Course "A" was meant for the small high school which lacked facilities while course "B" was intended for the three technical

schools (Regina, Moose Jaw, Saskatoon), the collegiates, and composite high schools which had the necessary facilities, and properly qualified teachers. The course was similar to the one outlined in 1944.

The mimeographed bulletin, Commercial and Home Economics Courses for Technical and Composite High Schools of 1950 retained the "A" and "B" courses. Only slight changes were made in the content of the course. The 1952 Programme of Studies for the High School, Bulletin D⁶⁸ outlined a one-credit home economics course for grades nine and ten while grades eleven and twelve could follow the "A" or "B" course depending on facilities and staff. The main core of the course in all four grades again centered around food, clothing and managing the home. Grade twelve added a section on personal and social development. The content of the "B" courses was the same as the "A", with the difference being that the "B" courses required double the time for two credits and included much more practical work in all fields. The 1957 curriculum⁶⁹ followed the pattern of the 1952 Programme, i.e., one-credit courses in grades nine and ten and the "A" and "B" courses in grades eleven and twelve. The grade nine and ten topics for study were, home living, helping the family plan its meals and learning to sew, while the grade eleven and twelve topics were entitled, home living, food (meals) for the family and clothing.

In the reorganization of Saskatchewan schools into Division III and IV, home economics was also altered. Home economics did not come

⁶⁸Bulletin D, 1952, p. 40.

⁶⁹Bulletin D, 1957, p. 8.

under the Technical Vocational Curriculum but rather as an optional subject in the high school course. At the time of this study, plans were being laid for a reorganization of the home economics course. In July 1968, a tentative outline for home economics in the first year of Division IV (grade X) came out in mimeographed form.⁷⁰ The course included the topics of management - a way of life, personal growth through management, community resources, family resources, and personal resources. The plan calls for a new course being introduced in each of grade eleven and twelve in succeeding years. Although the tentative course for grade ten home economics was outlined, once again as in the other vocational subjects, there would be a transition period and not all schools would be teaching it in the fall of 1968.

From the above resumé we learn that home economics in the high school was taught as an academic subject. Very little was done to make it a strictly vocational subject or as a preparation for future vocations. It was used as a credit and also a preparation for life. With the new course, the trend seems to widen the scope of the subject matter and up-date it, so as to keep it more in line with contemporary thought.

Enrollment in Vocational Education

Enrollments in vocational education from the beginning have been somewhat disappointing. In a survey of enrollments for the years 1920 to 1937, Jameson makes the following observation:

⁷⁰Home Economics 10.

Table IV makes it clear that only a small percentage of the student population of the province availed themselves of vocational courses. With the exception of the years 1922, 1923, and 1937 less than 10 per cent of the students in the secondary grades benefitted from a vocational course.

It will be noted that after the first years under The Technical Education Act, the enrolment in vocational schools was maintained at a comparatively steady level. No great fluctuations in enrolment appear from year to year until the year ending in 1932. This increase is accounted for by the opening of technical schools at Saskatoon and Moose Jaw in the fall of 1931. In the year 1937 there appears to be a decided increase, but this was partly due to an overlapping of enrolment as between different courses.⁷¹

A summary of the enrollment for the last few years is given in Table VIII.

TABLE VIII

NUMBER OF SCHOOLS AND TOTAL ENROLLMENT UNDER PROGRAM
NO. 1, 1962-63 TO 1966-67⁷²

	Number of Schools		Total Enrollment	
	Sask.	Alta.	Sask.	Alta.
1962-63	19	27	4,642	6,890
1963-64	30	35	6,371	11,206
1964-65	23	39	5,077	12,652
1965-66	18	39	4,291	13,196
1966-67	19	48	4,548	15,984

Table VIII points out that the number of schools in Alberta offering vocational education had increased steadily from 1962 to 1967,

⁷¹Jameson, op. cit., p. 135.

⁷²Canada, Department of Manpower and Immigration, Enrolment in Vocational Courses, 1966-67 and Number of Completions, Spring 1966, Program No. 1, Bulletin No. 7006-506 (Ottawa: The Queen's Printer, 1966), p. 5.

whereas the number in Saskatchewan generally declined. A similar trend is evident in the total enrollment. In 1962, Saskatchewan had approximately two thousand fewer students than Alberta, whereas in 1967 Alberta's total more than tripled that of Saskatchewan.

VII. CONTEMPORARY THOUGHT IN VOCATIONAL EDUCATION

One of the most important challenges that faces the current Canadian educator is to provide the best educational environment to enable future citizens to contribute to a dynamically changing society. The term dynamic society is not an idle one. Observe the many advances in science and technology that man is making to control and understand his environment. Canada's movement from primary industry to secondary and tertiary type industries demands an increasing supply of skilled manpower. The skills required for this type of transition militate against the average citizen's success in adapting to these new demands because of limited occupational competency.⁷³

Vocational and industrial arts education, because of their practical contribution, do provide an environment wherein students can through actual practice bring together the various truths that have been transmitted in the other academic disciplines.⁷⁴

Dr. Ziel has very adequately stated the importance of industrial arts and vocational education in our present society. Because of the rate of change in the world of work, the educational offerings in industrial and vocational education must reflect the thinking of industry and utilize the most up-to-date methods and content to prepare youth for the world ahead. Institutes and technical, vocational and composite high schools have made some progress in alleviating the situation in some

⁷³Henry R. Ziel, "Vocational Education in a Changing Society," The Alberta Teachers Association Magazine (Edmonton: November, 1962), p. 12.

⁷⁴Henry R. Ziel, "Industrial Arts and Vocational Education in a Changing Society," The Alberta Teachers Association Magazine (Edmonton: September, 1962), p. 16.

parts of Canada but much more has to be done. "Notwithstanding the service provided by these schools, the greatest shortage of deficiency in the field of technical and vocational education in Canada is that of facilities."⁷⁵

Even though these programs have developed more rapidly in Alberta, Quebec, and Ontario, the demand for this level of training comes from all provinces, and the facilities are not available to meet the growing needs.⁷⁶

It appears that the whole question of vocational education has not received due recognition nor concern from parents, the young people nor the government departments in charge of this phase of education.

Those responsible for education and training must recognize their responsibility for providing a complete and adequate program including the necessary opportunities for persons who have left the regular school system as well as those attending school.⁷⁷

There appears to be no doubt that facilities must be extended. In addition to facilities, the programs must be revised in such a way so as to be more helpful to the student in preparing him for his life's work. Some activity has been taking place in Saskatchewan, as well as in other sections of Canada, but it appears the progress is much too slow. Consequently, many young people drop out of school, poorly prepared to participate in present-day society and having insufficient educational background to enroll in post-high school technical or vocational schools.

⁷⁵D. E. Bridge, "Vocational Training To-day and To-morrow," Education, Training and Employment, Canada Department of Labour (Ottawa: Queen's Printer, May, 1961), p. 13. (Mimeographed.)

⁷⁶Ibid.

⁷⁷Ibid., p. 16.

We shall have to train, through formally organized programs, a much higher percentage of our manpower than ever before. We are in competition with the leading nations of the world where the development of manpower potential is given a high priority and technical and vocational training is a continuing process from school through years of employment. Impressive expansions and revisions of training programs has been taking place in Britain, Germany, France and Switzerland. Russia is making great strides in many fields of education. To maintain our position we must develop a new perspective in the problem of education and training for employment. In Europe activity, confidence, and prosperity have replaced fear and suspicion. Having done so well, they keep asking why does Canada seem to be "losing its way".⁷⁸

Not only is it necessary to extend our programs in vocational education at all levels, but there is also the problem of the type of course that would be best for the present day society. With the rapid technological advances of today, many people will have to be retrained several times during a lifetime. Programs that develop the ability to think will have to be outlined so that individuals could adjust and change more easily in the face of new situations.

It becomes crystal clear that requirements of vocational education for the future will be such as to give top priority to program flexibility.

Strong interrelationships must be developed between the closely related practical arts areas and the vocationally oriented curriculum areas, but beyond this, in keeping with evolving occupational requirements, there must be an evolving interrelationship between specific vocational-curriculum categories in order to meet the job of the future.⁷⁹

Furthermore,

⁷⁸C. R. Ford, "Vocational Education in the 1960's," Education, Training and Employment, Canada, Department of Labour (Ottawa: Queen's Printer, May, 1961), p. 23.

⁷⁹John Patrick Walsh and William Selden, "Vocational Education in the Secondary School," Vocational Education, Sixty-fourth Yearbook of the National Society for the Study of Education, Part I (Chicago: University of Chicago Press, 1965), p. 134.

A functioning program in vocational-industrial education is constantly undergoing changes to meet new needs. This means that the program must not only cover existing occupations but must also contemplate new ones growing out of technological developments.⁸⁰

The whole question is "Is our present society, and more specifically, Saskatchewan, doing its share to help the prospective citizens of tomorrow to take their place in that society?"

⁸⁰"What is Vocational-Industrial Education," Industrial Arts and Vocational Education, Vol. 50 (May, 1961), p. 52.

CHAPTER III

THE DESIGN OF THE STUDY

Procedures Used

The procedure used in the study was chronological. The decisions reached and legislation passed by both federal and provincial governments in regard to vocational education from 1950 to 1967 were taken as highlights of the development in order to update the historical section of the study. For the period before 1950, much of the information used here was taken from the study made by Jameson¹ who dealt with the highlights of vocational education in the period 1905 to 1950. The same information was used to determine the trends in several aspects of vocational education.

The data for the comparison of the Alberta and Saskatchewan high school programs of vocational education was obtained from the curriculum guides issued by the respective provincial Departments of Education.

After studying the trends and making a comparison of the two programs, conclusions were reached regarding the status of the Saskatchewan program and in determining the direction in which the province was moving in vocational education.

¹George B. Jameson, "Some Aspects of the Development of Vocational Education in the North West Territories from 1870 - 1905, and Saskatchewan from 1905 - 1950" (Unpublished Master's thesis, University of Saskatchewan, Saskatoon, 1955).

Sources of Data and Method

The method used in the study was bibliographical. First an intensive search of materials was made to find sources of information. During this time notes were made on cards and filed alphabetically. Interviews were held with officials of Canada Department of Labour and Canada Department of Manpower and Immigration to ascertain the extent of federal involvement in vocational education and to determine sources of necessary information. An examination was made of Acts, Annual Reports of the Department of Labour, Annual Reports of the Saskatchewan Department of Education, the Regulations of the Saskatchewan Department of Education, outlines of programs and courses of study issued by the Alberta and Saskatchewan Departments of Education and pamphlets and other publications of the federal Departments of Labour and Manpower and the Bureau of Statistics, masters' theses, books and periodicals. Use was made of primary sources wherever possible. Secondary sources were used if the above were not available.

Data-gathering Instruments

In order to assess the Saskatchewan program of vocational education a questionnaire study was made. The interview combined with the written questionnaire was used with the principals of the two comprehensive high schools in Saskatoon. The results of the interviews were included in the questionnaire study. A sample of the questionnaire is found in the appendix.

In a search through the literature no suitable instrument was found for the study so one had to be constructed. Two sources were

used as guides in the construction of the questionnaire. The first was a thesis by Ziolkowski² from where the general format was derived. The second was a work by Selltitz and others³ which outlined general guidelines for the construction of a questionnaire. The questions were mostly of a multiple choice variety so that they could be readily completed. Several questions were of an open-end variety so as to give individuals an opportunity to express their ideas at will.

In reality, there were five different questionnaires, namely, principals, shop, home economics, commercial (business education), and vocational agriculture. These were almost identical, except that each one was slanted toward the particular vocational education subject and was filled in by the instructor of that particular vocational education subject. The various parts of the questionnaire were checked for clarity and validity by individual colleagues who were directly involved in the teaching of the various aspects of vocational education. It was also checked by the chairman of the thesis committee. The questionnaire was then revised on the basis of the suggestions received.

The first step in conducting the questionnaire study was to obtain from the Chief Superintendent of Schools a list of all the superintendents in the Province of Saskatchewan. A letter was then sent to the sixty provincial superintendents of the Larger School Units

²Erwin Harold Ziolkowski, A Study of Practices Employed by High School Principals in the Supervision of Instruction (unpublished Master's thesis, University of Alberta, Edmonton, 1965).

³Claire Selltitz, Marie Jahoda, Morton Deutsch, Stuart W. Cook, Research Methods in Social Relations (New York: Holt Rinehart and Winston, 1964), Appendix C, p. 546.

and to the seventeen superintendents of public and separate schools in the cities of Saskatchewan which employed their own superintendents. The letter to the superintendents was a request for the names of principals of two schools in their own area in which vocational education was taught. It was felt that two schools would be a sufficient cross section of opinion to make the assessment. After a reminder three weeks later, one hundred percent returns were received from the superintendents. One hundred and fourteen names of principals of schools where some vocational education was taught were received. Eleven of the superintendents stated that there were no vocational education subjects taught in their areas.

Letters and a set of questionnaires or a part of them, depending on which phases of vocational education were taught in that school, were sent out to the one hundred fourteen principals. In the case where it was not known which vocational education subjects were taught in the school, all parts of the questionnaire were sent out. If these were returned and it was noted that a particular vocational education subject was not taught, it was not counted as a questionnaire that was sent out. Table IX outlines the returns of the various sections of the questionnaire.

An analysis and summary of the questionnaire results follow in Chapter V. From these findings and the results of the comparison of the Saskatchewan and Alberta programs, recommendations have been made in the final chapter.

TABLE IX
SUMMARY OF RESPONSES TO THE QUESTIONNAIRE STUDY

	Principals	Shop	Home Economics	Commercial	Vocational Agriculture
Questionnaires Sent Out	114	69	93	89	23
Returns Received	100	61	85	79	19
% Returns Received	88	88	91	89	83

CHAPTER IV

A COMPARISON OF THE VOCATIONAL EDUCATION PROGRAMS IN ALBERTA AND SASKATCHEWAN

Departments of Education have included various educational aims and objectives in their courses of study and in their statements of policy. Depending on how these aims and objectives have been interpreted by people who carry them out, the programs have experienced different measures of success. The Alberta vocational education program is considered to be one of the leading and more fully developed programs in Canada:

The province of Alberta has pioneered and led the way in many aspects of vocational education. The more recent of these include:

- (1) The development of truly vocational programs in the high school.
- (2) The development of degree programs in vocational education in the Faculty of Education.
- (3) The development of articulation of high school programs with programs of the technical institutes.
- (4) The development of articulation of high school programs with the Provincial Apprenticeship Training programs.¹

I. RATIONALE

The Purpose of this Chapter

Since the program of Alberta has been referred to as general background some minor comparisons can be made with the program of

¹R. H. Cunningham, High School Inspector of Vocational Education, Vocational Education Follow-Up 1967 (Edmonton: Department of Education, 1967), p. 9. (Mimeographed.)

Saskatchewan. This comparison has been made in this chapter. The comparison helped to determine some specific aspects of the adequacy of the present Saskatchewan program in the light of the Alberta program.

The vocational education program in the high schools of Alberta was not critically analyzed or evaluated for the purpose of this study. Factors such as aims, objectives, content, enrollment, expenditure and articulation were included to serve as the basis for comparison. The plan used in this chapter was a direct comparison; the various factors of each program were stated and the similarities and differences were noted. Wherever it was feasible, tables were used to summarize the information to facilitate making the comparison.

The Present Alberta and Saskatchewan Programs

The present senior high school program in Alberta includes industrial arts and vocational education. The latter field has been a part of the high school curriculum since 1962 and has been growing in popularity. For the purposes of this chapter both areas were used. The Saskatchewan program consists of technical and vocational courses for grades nine to twelve as they were outlined in 1957 and the new technical vocational courses for Division IV (grades ten to twelve) which were authorized in 1967. The technical and vocational courses of 1957 included shopwork, home economics, commercial and vocational agriculture courses. A separate program was outlined in 1957 for the three technical high schools in Moose Jaw, Regina and Saskatoon.²

²Province of Saskatchewan, Department of Education, Programme of Studies for the Technical High School, Bulletin D - Industrial Courses (Regina: The Queen's Printer, August, 1957). (Hereinafter referred to as Industrial Courses.)

Students were given an opportunity to work from a general shopwork program in grade nine to a specialized shop program of three or four courses at the grade twelve level. These schools also offered more extensive training in the commercial field to students wishing to enter employment after graduation.

II. FACTORS OF COMPARISON

Industrial Arts and Vocational Education

The first main difference between the Alberta and the Saskatchewan programs was that Alberta distinguished between industrial arts and vocational education. Courses were outlined for each program and both programs were taught at the senior high school level. In Saskatchewan, the courses that were designed for the Composite High School and called technical and vocational courses, were a form of industrial arts because they were not aimed at preparing students for entry into employment.

The course can best be defined as one in general vocational-industrial training. It is not industrial arts since it has a more specific end in view, yet it is not a course in trade training since it does not specialize in job proficiency. The primary aim is to provide basic experiences in the fundamental skills and related theory of several trade fields to the end that upon completion of high school, students will be better prepared to meet mechanical problems as they arise on the farm or in future trade courses of apprenticeship or trade schools."³

Nevertheless, the questionnaire study revealed that students pursuing the above-mentioned vocational courses were able to get some

³Province of Saskatchewan, Department of Education, A Guide to Technical and Vocational Courses for High School and Special Classes, Bulletin D (Regina: The Queen's Printer, 1957), p. 55. (Hereinafter referred to as Bulletin D, 1957.)

employment as a result of the limited training they received. Specialized training for a trade or vocation was left entirely to the technical institutes and to schools specializing in particular fields.

The Aims of the General Programs

Saskatchewan's technical and vocational courses as outlined in the 1957 Bulletin D⁴ were of a general nature and were, therefore, similar in aim to the industrial arts program in Alberta.

The Industrial Arts General Course is designed to meet the needs of two groups of students; those that can benefit from additional exploration in greater depth of content in a number of selected areas before enrolling in vocational courses and two; those that wish to broaden their understanding of the major technologies and gain more skill in the crafts.⁵

The aim of the Saskatchewan Composite High School was stated in the above Bulletin.

The concept of the composite high school is based upon the belief that it is the democratic right of students to have equal opportunity for preparation while in school for life beyond school, whether it be entering the professions, the home, the farm, business, or the skilled trades. Yet, the composite high school should not be regarded as a vocational school. It is neither designed nor equipped for offering many technical courses on a full trade level or of trade standards. However, it should be able to lay broad, solid foundations in the various technical fields which will make the transition from school to a life work more positive and easier.⁶

The Alberta program made provision for students to explore certain courses in greater depth before enrolling in vocational courses. The

⁴Ibid.

⁵Province of Alberta, Department of Education, Curriculum Guide for Industrial Arts General (Edmonton: The Queen's Printer, September, 1966), p. 2.

⁶Bulletin D, 1957, p. 3.

Saskatchewan program was meant to lay broad and solid foundations in certain technical fields so that the transition from school to work would be easier. Neither program prepared the student for a specific job.

The General Objectives (Functional Objectives)

Industrial art in Alberta and the vocational program in Saskatchewan were part of general education. The objectives were closely related to the general objectives (or functional objectives) of the educational program in each province.

The functional objectives of the secondary school in each province were identical, except that items two and three were reversed in the Saskatchewan list.

1. Personal development.
2. Growth in Family Living.
3. Growth toward Competence in Citizenship.
4. Occupational preparation.

Each set of objectives contained a lengthy list of goals, understandings, or attitudes under each heading. These, too, were almost identical. The objectives of education, therefore, were the same in both provinces.

The Aims and Objectives of the Vocational Programs

The Alberta senior high school program contained both the industrial arts courses as well as vocational courses. In Saskatchewan, the 1957 Bulletin D for High School and Special Classes provided the outline for vocational courses for most of the schools in the province. Never-

theless, as was mentioned above, this program was similar in its objectives to an industrial arts program. The 1957 Bulletin D for Industrial Courses that was mentioned above resembled a vocational program because it provided for increased specialization in chosen fields as a student proceeded through a high school. This program was authorized for the three technical schools in Moose Jaw, Regina, and Saskatoon. In 1967 a series of bulletins, each for a different field and each entitled the Division IV Technical Vocational Curriculum, was authorized for use in the schools. Because of the technical nature of the courses and the lack of facilities, very few schools had begun using them.

The latest figures show that there were six comprehensive schools teaching a part or the whole Division IV program, while five more such schools were under construction to be ready in the fall of 1969. Five more similar schools were in the planning stage and were expected to be ready by 1971.⁷

The Alberta vocational courses as outlined in the Senior High School Handbook⁸ were designed to prepare students for entry into employment. Some of the most commonly offered vocational courses were agricultural mechanics, beauty culture, building construction, commercial art, drafting, graphic arts, pipe trades, machine shop, production woodworking, electricity, electronics, food preparation, sheet metal,

⁷Saskatchewan Department of Education, Education in Saskatchewan, Technical and Vocational Education (Regina: January, 1969). (Mimeographed.)

⁸Province of Alberta, Department of Education, Senior High School Handbook, 1968-69 (Edmonton: The Queen's Printer, 1968).

welding, auto body, automotives, and appliance servicing. Together with these, there were the home economics special courses, namely, child care and home nursing, clothing selection and design, home economics - general course for boys, home economics - food course for boys, home economics crafts, homes and home furnishings, and needlework, plus special courses in business education. In the electricity vocational series guide the following general objectives were listed:

1. To impart to the student a knowledge of the role that electricity and electronics plays in industry today, and the opportunities that exist in this rapidly expanding field.
2. To equip the student with sufficient skill and knowledge such that he will be highly employable in the electrical field.
3. To provide the student with sufficient background in this area such that on entering the apprenticeship program, he will be able to advance at an accelerated rate on the basis of his proven ability on the job.
4. To prepare a student to a degree of competency acceptable to the Institutes of Technology, sufficient for entry into the second year of the Electrical Technology program.⁹

All the other vocational courses had identical objectives to numbers two and three above, except that they were related to their particular field. Several of the courses also included the first objective but again related it to their field. Although articulation had been well-advanced in Alberta, only the electrical course had objective four which dealt with articulation.

The general aims and objectives of the Saskatchewan Division IV program were listed in the individual curriculums of the different vocational fields, namely, the mechanical field, the construction field,

⁹Province of Alberta, Department of Education, Senior High School Curriculum Guide, Vocational Series, Electricity 12, 22, 32, Revised Edition (Edmonton: The Queen's Printer, September, 1968), p. 4. (Separate guides were issued for the other vocational courses.)

electrical-electronics field, and the drafting trade. Each of the first three fields were divided into a technology and a trade, with different objectives for each. Two of the objectives of mechanical technology were,

To prepare the student for advanced entry into the mechanical or industrial production technology as offered at the Technical Institute.

To prepare students to enter the mechanical field with sufficient skill and knowledge to be employable.¹⁰

In the mechanical trades, with the welding and fabricating trade as an example, two of the objectives were,

To prepare the student to a degree of competency acceptable for advanced entry into the various groups of the welding trades course at the technical institutes.

To develop in each graduating student sufficient skill and knowledge to make him employable in the welding and fabricating industry.¹¹

The same general idea was expressed in two of the objectives in other mechanical trades. Furthermore, two almost identical objectives to the ones above were listed in each of, construction technology and construction trades, electrical and electronics technology and the electrical and electronics trades, and the drafting trade. The basic idea was that, if a student chose any technology or trade, he would gain sufficient skill and knowledge to continue in a chosen field at a technical institute or to proceed directly to employment. The objectives of the Alberta vocational program did state that the program would equip a

¹⁰Province of Saskatchewan, Department of Education, Division IV Technical Vocational Curriculum, Mechanical Field (Regina: 1967), p. 1. (Mimeographed.)

¹¹Ibid., p. 43.

student to proceed to employment, or to advance more quickly in the apprenticeship program.

Articulation

The objectives of the vocational electricity program were the only ones that stated that the program prepared a student for acceptance by the Institutes of Technology. Nevertheless, there was articulation of the other high school vocational program with certain institute of technology programs.

Articulation has been developed between the high school vocational programs and corresponding programs offered at the institutes of technology so that high school graduates may enter the second year of a three-year program, usually referred to as year "B".¹²

Articulation had been developed in the following high school programs: electricity 12, 22, 32; drafting 12, 22, 32; building construction 12, 22, 32; machine shop 12, 22, 32; and electronics 12, 22, 32. Students completing any of these programs were able to enroll in the second year (Year "B") in an equivalent program at either one of the Technical Institutes. Some of these courses were articulated with the technical institute programs in Edmonton only while others with the Calgary institute programs only.

Most of the programs referred to above, did provide for articulation of high school programs with the apprenticeship programs. "A special apprenticeship pattern has been developed which gives recognition for the training and experience possessed by graduates in the

¹²Cunningham, op. cit., p. 22.

high school vocational programs."¹³ As an example, "A Vocational High School graduate in welding will be awarded one year of time credit and first year technical credit on passing the first year examination."¹⁴

The success of articulation in Alberta has been documented in the annual report of the Department of Education.

A few students experienced some difficulty in transferring into Year "B" courses at the Technical Institutes, but generally speaking the articulation seemed to be working out satisfactorily. The number of students entering the Institutes' programs through this articulation from the first graduating class was rather disappointing. Many students who would have gone on into the Technical Institutes' programs were unable to do so because they lacked the necessary mathematics and science courses.¹⁵

In the Saskatchewan Division IV program each one of the fields had, as one of its objectives, the idea of preparing a student for advanced entry into a technology at the technical institutes. It would appear then that provision had been made for articulation of the high school programs with the programs at the technical institutes. There was no mention made in the objectives of articulation of the high school programs with the apprenticeship programs.

Although the objectives stated that schools in Saskatchewan should equip a student for entry into the technical institutes, so far there was no plan of articulation.

There were several meetings held to plan articulation from the technology and trade programs to the corresponding programs

¹³Ibid., p. 24.

¹⁴Ibid., p. 25.

¹⁵Province of Alberta, Department of Education, Sixty-second Annual Report, 1967 (Edmonton: The Queen's Printer, 1968), p. 25.

at the technical institutes and sound philosophy is rapidly developing.¹⁶

In summary then, the Alberta high school vocational education programs had been articulated with certain technical institute programs and the apprenticeship programs. Specific patterns had been worked out and had met with reasonable success.

On the other hand, the Saskatchewan plan for articulation had not been worked out. Although the objectives did mention advanced entry into a technology for graduates who had credit for that technology in high school, as yet, there was no definite articulation with the technical institute programs. Furthermore, there was no provision for articulation of high school programs with the apprenticeship programs.

Content of Courses

In order to make the comparison of the Alberta and Saskatchewan programs, the programs were summarized in Table X. Similar programs were placed opposite one another for quicker comparison. The 1957 Saskatchewan Bulletin D programs with the exception of vocational agriculture, were placed opposite the Alberta industrial arts courses because they were similar in their objectives. Agriculture was not included here because Alberta did not have a similar program. Bulletin D programs in shopwork, home economics, commercial and vocational agriculture, were designed to give students broad and solid foundations in the various technical fields. The Alberta industrial arts programs

¹⁶Province of Saskatchewan, Department of Education, Sixty-second Annual Report, 1966-67 (Regina: The Queen's Printer, 1967), p. 79.

TABLE X

COMPARISON OF THE CONTENT OF THE ALBERTA AND SASKATCHEWAN PROGRAMS

ALBERTA ¹⁷	SASKATCHEWAN
I. GENERAL COURSES	I. TECHNICAL AND VOCATIONAL COURSES ¹⁸
A. Industrial Arts General	A. Basic Shopwork
1. Materials 10, 20, 30	1. Drafting, I, II, III
2. Electronics 10, 20, 30	2. Woodwork I, II, III
3. Drafting 10, 20	3. Metalwork I, II, III
4. Graphic Communications 10,20,30	4. Motor Mechanics I, II, III
5. Power Mechanics 10, 20, 30	5. Electricity I, II, III
	6. Welding I, II
B. Home Economics	B. Home Economics
1. Home Economics 10, 21	1. Grades 9 & 10 - 1 credit each
2. Fabrics & Dress 10, 20, 30	2. Grades 11 & 12 - 1 or 2 credits each
3. Foods & Nutrition 10, 20, 30	
Plus special courses:	C. Commercial
4. Child Care & Home Nursing 10	Grade IX X XI XII
5. Clothing Selection & Design 20	Business Essentials x
6. Home Economics - General	Record Keeping x
Course for Boys 11	Bookkeeping x x
7. Home Economics - Food Course	Typewriting x x x x
for Boys 10	Shorthand x x x
8. Home Economics Crafts 10	
9. Homes & Home Furnishings 20	
10. Needlework	
II. BUSINESS EDUCATION	II. BUSINESS EDUCATION (Division IV) ¹⁹
1. Bookkeeping 10, 20	A. Basic Business Education Courses
2. Accounting 30	1. Bookkeeping 10, 20, 30, 36
3. Business Fundamentals 10	2. Business Organization and
4. Business Machines 30	Management 36
5. Business Organization and	3. Calculating Machines & Math 26,36
Management 30	4. Communications 26, 36
6. Data Processing 22	5. Data processing 26, 36
7. Law 20	6. Economics 30, 36
8. Mathematics 11, 21	7. Law 26
9. Merchandising 20	8. Merchandising 20, 30, 36
10. Clerical Practice 20	9. Office Procedures 26
11. Office Practice 30	10. Shorthand 26, 36
12. Record Keeping 10	11. Typewriting 10, 26, 36

TABLE X (Continued)

ALBERTA	SASKATCHEWAN
13. Shorthand 10, 20, 30	B. Clerical Business Course .
14. Typewriting 10, 20, 30	1. Business Records 17, 27
III. VOCATIONAL COURSES	2. Calculating Machines and Math. 17, 27, 37
1. Agriculture Mechanics 22, 32	3. Communications 27, 37
2. Auto Body 12, 22, 32	4. Communications 27, 37
3. Automotives 12, 22, 32	5. Distributive Education 37
4. Beauty Culture 12, 22, 32	6. Employee Relations 27
5. Building Construction 12, 22, 32	7. Office Procedures 17, 27, 37
6. Commercial Art 12, 22, 32	8. Retailing 17
7. Drafting 12, 22, 32	9. Typewriting 17, 27, 37
8. Electricity 12, 22, 32	C. Special One-Year Business Education
9. Electronics 22, 32	III. TECHNICAL VOCATIONAL COURSES ²⁰
10. Food Preparation 12, 22, 32	1. Mechanical Technology 13, 23, 33
11. Graphic Arts 12, 22, 32	2. Mechanical Trades:
12. Machine Shop 12, 22, 32	a. Automotive - Levels II & III
13. Pipe Trades 12, 22, 32	b. Machine Shop - Levels II & III
14. Production Woodworking 12, 22, 32	c. Welding 24, 34
15. Sheet Metal 12, 22, 32	3. Construction Technology 13, 23, 33
16. Welding 12, 22, 32	4. Building Construction (Trades) 24, 34
17. Appliance Servicing 12, 22, 32	5. Electrical-Electronics Technology 13, 23, 33
Plus forestry, industrial chemistry, lithography, performing arts, sewing and design, executive housekeeping, industrial physics, and horticulture which were carried on in a few places on an experimental basis.	6. Electrical & Electronics Trade 24, 34
	7. Drafting Trade 14, 24, 34

Note: In the numbers following the courses, the first digit indicates the year in which the course is normally offered. The second digit indicates the kind of course; whether for matriculation, for vocational, or for other purposes. Some courses in Saskatchewan are designated with a "7" to distinguish them from the courses in the basic business education course. The numbers I, II, III refer to the year level of a course rather than a grade level.

¹⁷Senior High School Handbook, op. cit., pp. 12, 13, 14, 20.

¹⁸Bulletin D, 1957, p. 4.

¹⁹Province of Saskatchewan, Department of Education, Business Education Curriculum Guide (Regina: July 1, 1968), pp. ii, iii.

²⁰Province of Saskatchewan, Department of Education, Division IV Technical Vocational Curriculum (Regina: 1967). (Mimeographed.) (Separate Division IV curricula were issued for the mechanical field, construction field, electricity-electronics field, and the drafting trade.)

were designed to broaden the students' understanding of the major technologies.

All Saskatchewan programs in section I of Table X, page 77, were being replaced by programs in the Division IV curricula. They were being phased out as facilities were made available. Nevertheless, many schools were still using these programs. The Alberta home economics program was placed in Section I to point out the difference between it and the Saskatchewan program, although it was more of a vocational nature than the Saskatchewan program. Under the school reorganization in Saskatchewan, home economics was placed in grades eight and nine of Division III and a new course, Home Economics 10, was offered in grade ten of Division IV. The plan was to have new courses brought in next year in grade eleven and the following year in grade twelve. The Division IV Vocational Agriculture Curriculum outlined courses in agricultural technology, farm mechanics, and agricultural machinery. In short, all Saskatchewan programs named above were in a transitional stage and would be replaced by the Division IV programs, while the Alberta programs had been established for a number of years.

In sections II and III of Table X, page 77, business education courses and the vocational courses prepared students for specific jobs, for entry into technical institutes or for further study elsewhere.

The business education programs in each province were quite similar from the point of view of type and number of courses offered. The Alberta program had a total of fourteen areas with twenty subjects in all grades. Saskatchewan had eleven programs, for a total of twenty-three in all grades, in the basic business education course. The

Saskatchewan business education program was divided into a basic business education course, a clerical business course and a special one-year business education course. The clerical business course was similar to the basic business education course. It was for students who were unable to cope with the basic course. The special one-year course was for more mature students who had completed grade eleven or reached age eighteen. It placed emphasis on one of the three fields of secretarial, bookkeeping or merchandising. The course content was the same as for regular students.

The vocational courses in Alberta were much more extensive from the point of view of both number and variety of courses offered. Alberta had fourteen of the seventeen vocational programs in each of the three senior high school grades. In addition there were eight programs carried on in a few schools, on an experimental basis, in each of the high school grades. Saskatchewan had four main areas, three of which were divided into technologies and trades, with three different courses offered in the mechanical trades. There were nine areas with four being offered in each of the three grades in Division IV. The remainder were offered in grades eleven and twelve only.

Schools Offering Programs in Vocational Education²¹

In the 1966-67 school year, Alberta had twenty-five schools offering both industrial vocational and business education programs.

²¹Statistics for this section were obtained from the following sources: Vocational Education Follow-Up, 1967; Alberta Department of Education, Annual Report, 1967; Saskatchewan Department of Education, Annual Report, 1966-67. (These were mentioned earlier in this chapter.)

These schools offered from five to fourteen vocational areas, exclusive of business education. Besides the above schools, there were another twenty-three schools that were equipped to offer vocational business education programs. Another seven schools with full vocational facilities were in various stages of planning.

No statistics were found in the Annual Report of the Saskatchewan Department of Education regarding the number of schools offering extensive vocational classes. The questionnaire study revealed that there were six comprehensive schools or schools of that type that offered either a partial or a complete vocational education program. There were five other comprehensive schools under construction. These schools were scheduled to be ready for occupancy in the fall of 1969. Another five were in the planning stage to be ready for 1971. The foregoing revealed that considerable differences existed in the facilities for vocational education in the two provinces.

Comparison of Related Statistics

In order to obtain a more condensed picture of vocational education in the two provinces in question, various statistics of pertinent information were summarized in Table XI. Certain statistics were chosen because they had a direct influence on the expansion of vocational education in Alberta and Saskatchewan. Others were chosen because they revealed the results of the influence.

Statistics for the fiscal year 1966-67 were the most complete available. These were used in the comparison to point out the difference, and to establish trends in the different areas. A four year span,

TABLE XI

COMPARISON OF ENROLLMENTS, EXPENDITURES, AND COSTS

	Year	Alberta	Saskatchewan
1. Enrollment in Vocational Courses ²²	1963-64	11,206	6,371
	1964-65	12,652	5,077
	1965-66	13,196	4,291
	1966-67	15,984	4,548
2. Vocational Enrollment as a Percent of Total Secondary Enrollment ²³	1963-64	13.5	12.1
	1964-65	14.3	8.7
	1965-66	14.3	6.6
	1966-67	16.5	7.2
3. Federal Expenditures for Vocational High School Training ²⁴	1963-64	\$213,500	\$165,500
	1964-65	213,500	165,500
	1965-66	213,500	165,500
	1966-67	178,349	139,180
4. Estimated cost figures as a Result of the Technical and Vocational Training Assistance Act ²⁵ (accumulated figures)	1966-67		
	New Student Places	35,142	12,634
	Provincial Approved Expenditures	\$130,009,057	\$49,447,691
	Federal Contributions	\$ 80,897,976	\$27,168,033

²²Canada, Department of Manpower and Immigration, Enrolment in Vocational Courses, 1966-67, Program No. 1 (Ottawa: Dominion Bureau of Statistics, 1967), p. 5.

²³Ibid., p. 20.

²⁴Canada, Department of Labour, Annual Report, 1963-64 to 1965-66 (Ottawa: The Queen's Printer, 1966), pp. 21, 32, 70, 51. (Bound Annual Reports.)

²⁵Canada, Department of Manpower and Immigration, Annual Report, 1966-67 (Ottawa: 1967), p. 52. (Mimeographed.)

from 1963-64 to 1966-67 was considered sufficient to establish differences and to reveal trends.

Table XI points out the relative positions of Alberta and Saskatchewan in the field of vocational education. The enrollment figures in vocational courses of each province, clearly illustrated that the Alberta enrollments far exceeded those of Saskatchewan. In three of the four years, they more than doubled the Saskatchewan enrollments. The Alberta enrollments increased steadily during the four-year period, whereas in Saskatchewan enrollments decreased each year, except in the 1966-67 year when a slight increase was recorded. The trend, then, appears to be one of steady growth in Alberta and a decline in Saskatchewan for three of the four years.

A similar trend was evident when the vocational enrollment was taken as a percent of the total secondary enrollment. The Alberta percentage showed an increase from 13.5 to 16.5 in the four year period, while Saskatchewan decreased for the first three years from 12.1 percent, to 6.6 percent, and increased in the final year to 7.2 percent. The statistics above show that the Alberta program was gaining in strength and popularity. "Students are remaining in school longer, and the 'drop-outs' from the high schools are becoming fewer. Much of this can be attributed to the holding power of the vocational programs."²⁶

Section 3 of Table XI, page 82, shows the federal allotment to each province for vocational high school training.

²⁶Cunningham, op. cit., p. 7.

Under this program the provinces and territories share an annual allotment of \$3 million in proportion to the numbers in the age group 15 to 19 years old residing in the province or territory. This assistance may not exceed 50 per cent of the provincial costs of the programs, nor can any part of this money be used for capital expenditures.²⁷

Since the provincial allotments were based on a definite amount and on its population, the provincial shares remained constant. It would appear that each province received its full share.

Section 4 of Table XI, page 82, shows that the capital expenditures of Alberta on vocational education tripled those of Saskatchewan. As a result the federal contributions tripled as well. The larger expenditure was reflected in the larger number of student places that were available in the various vocational education institutes and schools in Alberta. From the time that the Technical and Vocational Training Assistance Act was passed in December, 1960, Alberta had provided 36,022 student places as compared to 11,834 in Saskatchewan.

The financial aid for capital expenditures was dependent on the amount a provincial government spent and on its population. The above Act stated that the federal government would provide 75% of the cost of new buildings and equipment until a limit based on the population was reached. The estimated population as of April, 1967 was 955,000 in Saskatchewan and 1,483,000 in Alberta. In view of the above figures it can be seen that there is a marked discrepancy between the two provinces. It can be concluded that Saskatchewan did not fully avail itself of the federal aid for capital expenditures.

²⁷Canada, Department of Labour, Annual Report, 1965-66 (Ottawa: The Queen's Printer, 1966), p. 70.

Considering all the factors that were used in comparing the two programs, it can be seen that the vocational education program in Alberta was more advanced and more extensive than that of Saskatchewan. The aims and objectives of the two programs were quite similar, but on such points as articulation, content, number of schools offering vocational education, enrollments, and expenditures, Alberta was considerably further advanced than Saskatchewan.

CHAPTER V

ANALYSIS AND SUMMARY OF THE RESULTS OF THE QUESTIONNAIRE STUDY

The questionnaire study was used to assess the vocational education program in Saskatchewan. In actual fact, the questionnaire study consisted of five parts, or five questionnaires in order to get the viewpoints of the people involved in vocational education in the schools; namely, the principal, the shopwork instructor, the home economics instructor, the business education (commercial) instructor and the vocational agriculture instructor. Initially, the provincial superintendents of schools and the city superintendents were requested to supply names of principals of two schools in their areas where all, or part of the vocational education subjects were taught and to specify the vocational education subjects that were taught in those schools. Eleven superintendents stated that there were no vocational education subjects taught in their units. When the names were received, the necessary questionnaires were sent to the principals for distribution and completion by the various instructors in the school. A summary of the number of questionnaires sent out and the number and percentage of returns is found in Table IX, page 65. The results of the questionnaires were summarized by questions or by groups of questions where the information was related. Wherever possible, the results were summarized and placed in table form.

In this chapter many references were made to the different programs or curriculum guides that were used by the schools in carrying out the program in any particular vocational education subject. Because these curriculum guides were mentioned many times an abbreviated title was used. The Curriculum Bulletin D, A Guide to Technical and Vocational Courses for High School and Special Classes, 1957, was referred to as the 1957 Bulletin D, the Division IV Technical Vocational Curriculum, 1967 in the mechanical field, the drafting trade, the electrical-electronics and the construction field was referred to as the 1967 Division IV curriculum, the Curriculum Guide, Business Education, 1967 was referred to as the Business Education Guide, the Home Economics 10, Management for Living (Tentative), 1968, which was the first of the Division IV home economics curricula, was referred to as Home Economics 10, and the Curriculum Guide for Division III, 1957, was referred to as the Division III Guide.

I. THE PRINCIPALS QUESTIONNAIRE

One hundred fourteen questionnaires were sent out to two principals in each of the sixty Larger School Units in the province of Saskatchewan and to two principals in each of the seventeen school systems in the larger centres. One questionnaire was sent to the centres where there was only one school. One hundred questionnaires were returned for an eighty-eight percent return.

The returns showed that there were thirteen Collegiates in the sample, with one of these having grades eight to twelve and another one grades ten to twelve. Four areas had comprehensive schools, one a

technical high school and two had a high school with grades nine to twelve. There were twenty composite high schools, grades nine to twelve, which included two schools with grades ten to twelve and one with grades seven to twelve. Thirty-four reported having combined junior and senior high schools and twenty-three had grades one to twelve under one administration. The survey included two junior high schools as well.

From the question on experience, the following results were obtained: three principals had no experience, twenty-three had between one and five years experience, nineteen had between six and ten years experience, nineteen had between eleven and fifteen years experience, seventeen had sixteen to twenty years experience, sixteen had over twenty, while three did not complete the question on experience. The above resumé showed that the principals were well-qualified from the point of view of experience.

The one hundred returned questionnaires showed that shopwork was taught in sixty-five schools, home economics in eighty-five, business education (commercial) in eighty-five and vocational agriculture in twenty-two schools. The figures of sixty-five and twenty-two in shopwork and vocational agriculture, respectively, showed that these two areas were not offered too extensively.

In section B of the questionnaire, the principals were asked to express their judgment of the vocational education situation in their schools. In questions one to seven inclusive and question nine, they were asked to check the statement or statements which most closely represented their opinion or described their situation.

The first question set out to find out if sufficient time was allotted to the teaching of vocational education. Sixty-seven people answered in the affirmative and twenty-nine answered in the negative. It would appear that most schools had allotted sufficient time to the teaching of vocational education.

The second question endeavored to find out if the principals thought that the vocational education courses that were offered in their schools, adequately prepared the students to continue in a chosen field; whether it was further education or a job. Thirty-nine principals stated that students in their schools did acquire a sufficiently valuable background to continue in their chosen field, while fifty-three felt that their students did not get an adequate background. Some of the reasons given by principals for thinking that their students were not receiving an adequate background in their chosen field were as follows: that there was a shortage of dictating and transcribing equipment in the commercial field or equipment and facilities in other fields; that there were insufficient credits or courses offered in the different fields, that there was not enough variety of courses offered; that vocational education courses were too narrow in coverage to meet present requirements of post-secondary pursuits, or simply did not have enough depth, or that the offerings were limited in the smaller school. A few of the schools stated that the courses did not intend to give students a background for further training while others felt it was sufficient to arouse interest in a chosen field or just explore it rather than prepare the students for a vocation. Others stated that there were very few students who planned to continue in any particular

field and simply took a course as a credit for graduation. One principal stated that the philosophy of the comprehensive school emphasized general education and that vocational education was offered for that purpose, rather than preparation for a vocation. He added that students would certainly be sufficiently prepared. It appeared that the courses were not designed for the purpose of preparation for a future vocation.

The next two questions (3 and 4) dealt with the two programs that were in force at the present time, namely, the 1957 Bulletin D and the 1967 Division IV Curriculum. The questions set out to determine if facilities in the schools were adequate enough to carry out the courses outlined in these guides. Fifty-seven principals stated that facilities were adequate enough to carry out the program in the 1957 Bulletin D. Thirty-nine stated they were inadequate. On the other hand, only fifteen stated that the facilities were adequate enough to carry out the program in the 1967 Division IV curriculum, while seventy-nine said that facilities were inadequate. The affirmative replies to the question dealing with the 1967 curriculum were mostly from the larger centres. In several cases where the answer was in the affirmative, regarding the 1957 Bulletin D, a particular field was named (mostly commercial and home economics) where facilities were adequate. Over one-half of the returns mentioned the lack of facilities, space, equipment and staff.

According to the fifth question returns, the greatest drawback in the teaching of vocational education was the lack of facilities--an opinion supported by fifty-nine principals. Forty-two principals

checked lack of qualified staff as a drawback while thirty-five gave other reasons as a serious drawback. The other reasons included such things as small enrollments, difficulty in arranging the timetable, the heavy teaching load, the lack of interest, the opinion that all students must go to university, and the low salary scale to get properly qualified staff for vocational education subjects.

Question six was interpreted to mean the same thing as question four, therefore, the answers turned out to be very similar. Seventy-seven principals answered "no", while nineteen said "yes" to the question whether it would be possible to bring in the 1967 Division IV Curriculum into the present school organizations. Three main reasons were given as to why it could not be brought in. The first of these was the lack of facilities and equipment, thirty-nine people stated this reason. Twenty-six stated that the enrollments were too small and more centralization would be needed; and twenty-one stated that there was insufficient staff to bring it into the schools. Other reasons that were given were that there was a lack of space (8); the cost of facilities and operation did not warrant the large expenditure because of the small enrollments (6); and that it was against the school board policy (1).

In regard to the best school organization for offering an adequate vocational education program throughout the province of Saskatchewan, the tally was as follows: thirteen were in favor of the present Larger Unit School system, although a few felt that more centralization would be needed; forty stated that the larger regional technical schools, with several throughout the province, would be best; forty-six

avored the comprehensive schools; six people were in favor of some other organization. One suggestion was to have two or three large schools in a Larger School Unit offer different aspects of the program on a semester basis, with student mobility within the School Unit. Another suggestion was to make vocational education training entirely post secondary, with places at the trades level for all those without a full grade twelve; while another stated that there should be trade schools after grade ten and technical schools after grade twelve. Community colleges which would accept drop-outs and people of all ages as long as they had a desire to learn, were recommended by one individual.

As far as the question of availability of qualified staff for the vocational education purposes, in question nine, the returns showed that fifty percent of the schools had difficulty in procuring qualified staff. Forty-two principals stated "yes" and forty-three stated "no". Several principals qualified the "yes" by stating the staff was available for present courses only. In the fields of home economics and commercial the results were more encouraging. Sixty-four principals stated that staff was readily available in home economics, although many were difficult to retain, while twenty-seven stated that staff was not available. In the commercial field fifty-seven checked the "yes" while thirty-three checked the "no". In vocational agriculture, twenty-one principals stated that staff was available while thirty-eight stated that it was not.

A great number of suggestions were made in question eight stating what could be done to improve vocational education courses in

the particular schools. Besides the suggestions that were mentioned earlier, that is those of extending facilities, procuring more equipment and staff, making more money available for vocational education, more centralization to increase enrollments so as to warrant the expenditure of more money, the following ideas were mentioned by the principals. One idea was to extend the Industrial Arts concept throughout high school as a part of the program of general education, and not as training for marketable skills. Another stated that a careful selection be made from the proposed course offerings, then add the equipment. Other ideas were as follows: (no attempt was made to categorize the suggestions or to put them in order of importance)

A reduction in the teaching load for individual help and research into methods.

A more sophisticated guidance program which would channel more students into this field (vocational education).

The Unit "go" into some agreement with the parents; pay the tuition and enroll our students in the Weyburn Institute or Moose Jaw or Regina, or offer a different course centrally for the "East" or "West" side at different points and different times.

The attitude of the Unit Board would have to be changed so that they understand the purpose and philosophy of vocational education. This would eliminate most of the problems.

There appears to be a conflict of objectives and definition of what constitutes a trade and what constitutes a vocational program. The comprehensive schools have assumed or attempt to assume trade training, something they did not initially intend to do.

We need higher enrollment to make further expansion feasible. Our cost per student is beginning to run higher every year. I believe we have expanded too far already for the size of our school. When three degree teachers draw students from the same Grade 12 room (three subjects back to back) I believe we are becoming uneconomical.

Another individual voiced his opposition to larger schools.

I am opposed to schools housing as many as 1500 students. It is an impossibility to get to know students in a 1500 population situation. 200-500 is sufficient. More staff could be employed and those vocational courses offered which need little change in plant and facilities (i.e. Vocational Agriculture).

Improvement is not recommended for a school this size; it is too costly (200 enrollment - grade seven to twelve).

Streaming into business education and technical education is "bad" practice. Students tend to "flunk" into them. If students could choose, in addition to English, an elective of their choice, and have electronics accepted on a par with physics for university entrance, a more realistic position would be taken by students. At present, vocational education seems to convey to students a "second-rate-citizen education". The courses themselves are not the problem as far as our school is concerned.

We have the facilities--did offer it (Home Economics) for ten years:- but for the second year we are unable to staff that department.

Offer all subjects, or at least more of them (wider range).

What we offer we think is pretty good. (Remark from a small town with a Composite High School - Grades 9 to 12).

New course outlines (curricula) brought up to date and kept in line with our rapidly changing technology.

After considering the size of school we have, I believe we do have a good exploratory vocational education program. We could improve it by cutting down on class size and by having more floor area made available.

The School Unit could offer home economics in one centre, commercial in another and technical subjects in the third. Students to be free to attend any one school and change schools at the end of a semester. Vocational-technical courses be given the same importance as the academic ones.

Recognition of vocational courses and modified academic courses for entrance to Technical Institutes and in some cases University. Recognition of the opportunities in the field of the technologies.

Nothing--unless the enrollment at least doubles (207 at present --grades 7-12).

Smaller class loads and more up-to-date equipment.

Work closer with industry and have a working on the job program

between Education and Industry.

A more interested public.

With the crowded conditions I think we are doing all that is possible.

I feel the students in this school have a wide variety of subjects available to them, i.e. 14 in grade 12. With an enrollment of 15 students we have gone as far as we can.

Inservice training or summer school training for vocational teachers.

More consolidation . . . then larger high school enrollment would warrant offering of courses. We have fairly good equipment for woodworking, but it is not used because of the small enrollment.

Some of the technologies appear to be too difficult for the high school student who lacks university ability (e.g. Electrical-Electronics). More emphasis on journeymen-teacher training in method and classroom procedures in the teaching of their specialty.

Some decisions as to content of courses to be offered in a comprehensive school. A very hard look at entrance requirements to university and vocational institutes. Recognition of comprehensive school training in shops by the Technical Institutes.

It is quite satisfactory at the present time - more guidance would be helpful in directing students toward vocational areas with a view to pursuing that area as a career.

To get more of the "A" students into the programme, but with "U" (university) admission requirements, students do not have time to take vocational courses.

Make it possible for our graduates to receive post high school training in their field at the Institutes in Saskatoon and Moose Jaw based upon our recommendation of the potential of each student.

Educate the public as to the value of these courses. The present attitude is to force students into these areas if they have been unsuccessful academically.

The present technology approach is too complex for 60% of our students. A modified approach must be taken.

In question ten, the object was to get to the root of the vocational education situation. Principals were asked to state what

problems they encountered in getting staff for their schools. Fifty-one returns stated that qualified staff was simply not available, regardless of where the school was located. One of the problems here was to find people who had trade experience and a teacher's certificate. One principal stated it this way. "The shortage is critical in all areas and especially in the shop areas. Usually, tradesmen must be sent for educational training so that they are qualified to teach." (This is done on a bursary system.) Another twenty returns stated that qualified staff was not available because the school was in a small town, which often lacked modern conveniences, or that suitable accommodation was difficult to obtain, or teachers were often expected to teach in subject areas in which they were not qualified, or they had to carry out an itinerant program. The next largest group of nineteen, stated that for the present they had not experienced any real difficulty. A few stated that problems could arise with expansion for Division IV. Most of the people who mentioned that there was no problem in obtaining staff were from larger centres or from centres that had been established for a longer time. Some of the reasons given for not having any difficulty was that the school was located close to Saskatoon or Regina and this attracted some people because they were close to a university. The problem here was to retain these people after they or their spouse had completed their training. There were five people who stated that salaries were factors in attracting and retaining staff in the specialized courses. It was felt that industry paid higher salaries than school boards for people with specialized training, so it was difficult to attract journeymen into the teaching field. Another reason was that

salaries in the rural areas were lower than those in the urban centres. The following problems were mentioned by two principals in each case: the Unit was unwilling to approve more staff, teachers from outside of Saskatchewan were unfamiliar to the system and there was some loss experienced in their adjusting to a new program, the principals did not interview the teachers for the positions or that the principal was not consulted in the appointment of teachers, and that it was difficult to obtain one individual to teach all phases of a program, especially in shopwork.

In the final question of the principals' questionnaire, principals were given an opportunity to make any comments they wished in assessing the vocational education program in their school or as they saw it beyond their school. Several principals reiterated points that were mentioned in earlier questions, i.e. lack of facilities, staff, etc. These were not included in the summary in this section. There were forty-eight comments made besides the ones mentioned above. From the review of literature, there is considerable support for the idea of having a good general education program at the high school level and leaving the job training to other institutions. This idea, in one form or another was supported in approximately one quarter of the comments made by the principals. Vocational education should be part of general education, the public schools were not the proper place for vocational education, post high school training was necessary, and in the ordinary high school it should be exploratory only. The purpose in another school was general education and no attempt was made to finalize a student's education in a particular area, with the exception of pos-

sibly the commercial field. In other words, the idea was to give the student as broad an education as possible, with emphasis on enabling the student to absorb further education, or training, rather than attempt to turn out any finished product. Others expressed concern that vocational education in the secondary school would fail if it attempted to qualify people for the labour force directly. It was also felt that there should be specialized schools for vocational courses. These would serve the purpose better than the comprehensive schools, by avoiding conflicts between academic teachers and vocational teachers regarding teaching load, teacher-pupil ratio, preparation time, etc.; which were naturally different because of the nature of the courses. Taking vocational education out of the high school would also eliminate the conflict with the academic subjects by not competing for the time allotment.

Approximately one-sixth of the comments favored the program as it existed in their school, or in vocational education generally throughout the province. The program seemed to have won approval of the superintendents. It was felt that the program filled a definite need as an addition to the academic courses and at the same time it helped create a better attitude toward school in the students. It had also proven its worth over the years in lower dropout rates and retention of students through informed interest in specific fields. The respondents felt that the program had given students an opportunity to explore some of the vocational fields and discover their interests and aptitudes in some

of the fields. It had provided a general orientation, offered basic skills and experiences upon which a student had added to later on. Because the program had been successful and a wide variety of grade eleven and twelve programs had been offered, one board, at least, had decided to proceed with the building of a comprehensive school.

Five remarks were directed at the administration of the program either at the provincial level or the local level.

These principals felt that there was a lack of direction or purpose for the program, nor had there been any consistent underlying philosophy for the vocational education program. Furthermore, the Department of Education and the Advisory Committees had not agreed upon what was to be done in vocational education and so the program was subject to indecision and procrastination. There should have been a greater effort to provide material in the courses which would be more meaningful and interesting to the students. Vocational education people should have been available from the Department of Education to give guidance and direction in planning programs with new teachers.

Another five comments were directed at the local school boards. These people felt that their boards were not fully aware of the benefits of vocational education, therefore, there was no attempt to provide for a sound vocational education program. More public relations directed at school trustees was necessary so as to acquaint them with the authentic needs of schools. Vocational education was a necessity and school boards must cooperate to find solutions to the various problems, since only about 10% of the students proceeded to university. One individual stated that arrangements should be made with School Boards in larger

centres where more vocational education options were offered and have students enroll in these courses, if they wished to pursue a technical-vocational career.

There was a conflict of opinion between the two philosophies regarding vocational education. On the one side you had people who stated that vocational education was for students of various abilities, and those who contended that it was for those who under-achieved, those who were weak academically, or those of below-average ability. Four individuals supported the latter idea. Students as early as the grade 8 and 9 levels should drop academic subjects and devote full time to vocational subjects. Courses should cater to the interests of the under-achiever because these courses had provided a real need particularly for the student with low ability. On the other hand, the needs of the student with higher ability, who was interested in the vocational education field should also be met by expanding courses and offering enough classes in his field of interest.

It was felt that much public relations must be done in order to impress upon the public the opportunities available in the vocational education field. The public was still university oriented and was not aware of these opportunities. Furthermore, vocational education courses should not be treated as extras but should be given equal priority to mathematics or science. In other words, they should be considered a credit for university entrance; they should be recognized by the technical institutes as preliminary training for their courses. Many students unrealistically followed academic courses whether they could handle them or not, in order to meet university requirements. Others who did well at school and would have liked to take some technical

courses could not do so because of university requirements. It also seemed quite difficult to enroll in the Technical Institutes, either because of very high entrance requirements (in some cases a higher average than university requirements) or preference for admittance appeared to be given to upgrading former graduates over the immediate high school graduates.

Public relations would also make people more aware of the rightful place of vocational education in the high school. Students, parents and taxpayers were often of the opinion that schools offered or should offer courses which were designed to turn out qualified tradesmen, but this was not really the case. Quite often this over-stress led to disappointment and disinterest. This idea, too, seemed to break down the argument for general education.

Summary

Principals stated in a ratio of five to four that the vocational education program did not prepare students for work or further study because facilities were inadequate, programs were not extensive enough with insufficient depth and variety. Most schools were simply too small to offer an extensive program.

In assessing the 1957 and 1967 programs, principals stated fifty-seven to thirty-nine that facilities for the 1957 program were inadequate, while only fifteen stated that facilities were adequate for the 1967 program. Generally speaking, equipment for home economics and commercial was better than for other vocational education areas. Lack of facilities and qualified staff were the most often stated drawbacks in the teaching of vocational education. It was for the two reasons

above plus the low enrollments, that principals stated, that it would be impossible to bring in the 1967 program completely. Facilities would have to be improved, more well-qualified staff would have to be attracted to the vocational education field, and some scheme for increasing the enrollment would have to be instituted before it would be feasible and possible to bring in the 1967 program. Other suggestions by the principals were stated as they appeared with no endeavor to categorize them or place them in order of importance.

Approximately 50% stated that staff was hard to get simply because, staff was not available, or that instructors would not go to the smaller school, because of inadequate living accommodation or because vocational education instructors were expected to teach in other subject areas. Furthermore, staff for shopwork was hard to get because industry paid more for the skilled workman-turned teacher.

Forty-six principals thought that the comprehensive school was the best organization for offering an adequate vocational education program in Saskatchewan. Approximately the same number favored the larger regional school organization.

Vocational education should be part of the general education in the high school, with specialized education left to the special schools beyond high school. In other words, it was to be exploratory at the high school level and specialized beyond that. The next largest group of principals favored the program as it was because it did prepare students basically for work or for education ahead. It also gave students a release from straight academic work and in this way helped maintain student interest and formulate good attitudes toward the school.

II. THE SHOPWORK QUESTIONNAIRE

Sixty-nine questionnaires were sent out to shop instructors in schools where the superintendents indicated that it was being taught. Fifty-nine questionnaires or eighty-six percent were completed and returned.

Question one revealed the experience of the shop instructors. In the first category of no years to five years experience there were twenty-seven people, with two of these having no experience. Fifteen shop instructors had between six and ten years experience, eight had between eleven and fifteen years experience, four had between sixteen to twenty years experience, three had between twenty-one and twenty-five years experience, while four had over twenty-five years experience.

The qualifications of the shop instructors, in many cases, appeared to be of a low standard. Of the sixty-one individuals who completed the questionnaires, only seventeen had a degree. Ten of these had a B.Ed. with an Industrial Arts major from the University of Saskatchewan. One of these had, in addition to the B.Ed., a B.A. and an M.A. in Industrial Arts. Another one had journeymen's papers with the degree, while another had a B.Ed., plus a professional B certificate and graduate classes from the University of Alberta. The remaining individuals in this category had other degrees from other universities with a diploma in Education, or some classes in Education. Besides the two that were included with the people who had degrees, another seventeen instructors had journeymen's papers in some field, with a Standard A, Standard B, Technical B, university classes, vocational certificate or some other training, either at a Technical Institute or a Teacher's

College in England. Nine instructors stated that they had anywhere from one and a half to six university classes as their training. Four people said they had a professional "B" certificate, one of these had journey-men's papers and one had a Technical "B" with the Professional "B". The remaining fourteen instructors reported a wide variety of training. Among these were the Standard A, Standard B, Teacher's College training in England, a Specialist Vocational, Technical B, and a Special Handicraft Certificate from England. One individual had only one class, with twenty-six years experience in industry, and one reported no training.

The survey showed that most shop teachers were teaching most of the time in some field of shopwork. Thirty-four instructors out of sixty-one taught 100% of the time while sixteen taught between seventy-five and ninety-nine percent of the time. Seven shop teachers taught between fifty and seventy-four percent of the time and four taught between twenty-five and forty-nine percent of the time in shop courses. It would appear that where shop courses were offered there were enough classes to keep at least one instructor in the shop full time.

Shopwork was taught to a variety of grade combinations. Nineteen schools offered it to grades nine to twelve and seventeen offered it to grades eight to twelve. There were six schools offering it to grades ten to twelve, six, to grades seven to twelve, five schools to grades eight to ten, two schools each to grades eight to eleven, and grades nine to eleven and one school each to grades seven to nine, seven to ten, and eleven to twelve. Most of the grade nine to twelve offerings came from the larger centres while the eight to twelve offerings came from the Larger Units.

The vocational education field was in a period of transition. New curriculum guides were provided in 1967, extending many courses, and allowing schools to choose between these courses and those outlined in the 1957 Bulletin D. Because of the extension in the courses, only a few schools were properly equipped to adopt these courses in their schools. Some of these schools were in a period of transition and had not gone completely into the new technical courses. The remaining schools were following the 1957 Bulletin D that was authorized for grades nine to twelve. Grades eight and nine followed the new Division 3 guide. There was no authorized program for grade seven. Because of the transition period, several course outlines or adaptations of course outlines were followed by the schools. In grade seven, one school followed its own curriculum while seven schools used an adaptation of the Division III guide. In grade eight, nineteen schools followed the Division III guide, five used a modification of the Division III guide, five used their own outlines, while two used the 1957 Bulletin D. In grade nine, twenty-five schools used the Division III guide, ten used the 1957 Bulletin D, ten used a modification of the 1957 guide, and eight used their own curriculum or some combination of curricula. In grade ten, twenty-eight used the 1957 Bulletin D, seven used a modification of it, seven used the Division III guide or an adaptation of it, six used their own outlines, five used a combination of the 1957 and 1967 guides, while four used the 1967 Division IV curriculum. In grade eleven, thirty-one schools used the 1957 Bulletin D and five used a modification of it. Eight schools used a combination of the 1957 Bulletin D and the 1967 Division IV program, three had their own cur-

riculum, two used the Division III guide or an adaptation of it, and two were using the 1967 Division IV curriculum completely. In grade twelve, twenty-nine used the 1957 Bulletin D, and four, a modification of it. Seven schools used a combination of the 1957 guide and the 1967 Division IV program. Three schools used the 1967 Division IV curriculum, two used their own program, while two used the Division III guide or an adaptation of it.

Question six, dealing with compulsory shopwork in the different grades, showed that in grades seven, eight and nine it was compulsory, while in grades ten, eleven and twelve it was not. All schools reporting shopwork in grade seven said it was compulsory. In grade eight, twenty-eight made it compulsory and two did not. In grade nine, thirty-nine had compulsory shopwork and thirteen did not. In grade ten it was fifteen to thirty-seven for the noncompulsory, while in grade eleven, four schools had compulsory shopwork and forty did not. In grade twelve, three schools had compulsory shopwork and thirty-nine did not.

The most popular shop courses were Drafting and Woodwork as shown in the following summary of responses to question seven: (The numbers indicate the number of schools teaching the course.) Drafting I-36, Drafting II-23, Drafting III-18, Woodwork I-33, Woodwork II-37, Woodwork III-30, Metalwork I-13, Metalwork II-11, Metalwork III-7, Motor Mechanics I-11, Motor Mechanics II-14, Motor Mechanics III-7, Electricity I-9, Electricity II-6, Electricity III-2, Welding I-7, Welding II-7.

There were only a few schools that had gone into the 1967 Division IV curriculum. The following fields were taught in some of the schools: Mechanical Field, Construction Field, Electrical-Electronics,

and Drafting Trade. Some of the schools offered only parts of these fields the first year and were slowly phasing in the 1967 Division IV program into their schools.

TABLE XII

THE NUMBER OF SCHOOLS OFFERING DIFFERENT NUMBER OF CREDITS IN SHOPWORK

Credits	Grade					
	7	8	9	10	11	12
1	7	22	35	33	25	24
2		1	11	17	16	11
3				3	7	9
4					1	1

It would appear that not enough schools allowed a sufficient number of credits in order to expose a student to the various facets of shopwork.

Students of differing abilities enrolled in shopwork. The survey showed that eighteen schools had students of varying abilities taking shopwork courses. Many of these would be those who had to take courses because they were compulsory in that particular grade. Nineteen schools stated they had average ability students enrolled in shopwork, fourteen stated they generally had average and below average students, and five schools stated that students of below average ability enrolled in shopwork. Two schools stated that it depended on the grade--usually grade nine and ten students were of average ability and grade eleven and twelve students were of below average ability.

Although returns varied as to why students pursued shopwork courses, one could draw two important conclusions from the choices. The largest percentage of students chose shopwork as a credit for their

matriculation standing. The second conclusion was that students chose shopwork simply as an interest field, and one that they could probably use for personal satisfaction rather than as a direct credit. Twenty-four schools reported that between 75 and 100 percent of the students chose shopwork in order to use it as credit for matriculation. Eleven schools said that less than seventy-five percent of the students chose shopwork as credit for matriculation. Thirty-nine schools said that their students chose shopwork so that they could use it as a basis for entry into a Technical Institute. Twenty-six of these were in the "below 25 percent" category, nine in the twenty-five to fifty percent range and four between the fifty and seventy-five percent level. Twenty-six schools stated that students chose shopwork as training for entry into employment. Fifteen of these stated that less than twenty-five percent of the students chose shopwork to help them in their employment. The remaining reported percentages of up to one hundred, for this purpose. Twenty schools gave other reasons for students choosing shopwork and approximately half of these chose it because of their interest in it. The others chose it for the following reasons: shopwork was compulsory, it was part of a general education, aimless students, and hobby purposes.

The next section of the questionnaire gave the individuals an opportunity to express their opinions about shopwork as they saw it.

The consensus of opinion in the first question was that there was sufficient time allotted to the teaching of shopwork. Forty-two of the returns stated there was enough time, while eighteen said there was not enough time. Two returns said that it depended on the grade.

Generally speaking, there was enough time for grades nine and ten and insufficient time for grades eleven and twelve classes.

Half the returns showed that students who had enrolled in shop-work received an adequate background so that they could continue, or more easily pursue a field in which they were interested. The half that gave a negative reply to the question, qualified it in various ways. One of the remarks that was made most often (thirteen out of twenty-seven) was that the high school was not the place for trades training, nor was it training for particular fields, but was meant to give a general education to the students, one that would give students an opportunity to explore certain areas. Five others felt that there was a need for more time, better facilities, better qualified staff and better equipment before students could be given the adequate background of training. Three individuals stated that the curriculum was outdated and could not serve the purpose suggested in the question. Two others felt that the students at the high school level were not mature enough to be able to decide on their life's work; others stated that the courses would have to be broadened in order to fulfill the purpose. Two shop instructors stated that many students had found employment as a result of training received in the high school.

On the question of the status of facilities in the school, twelve stated that facilities were adequate for all shop courses. (Most of these came from the larger centres.) Twenty-eight said the facilities were sufficient for basic shop only, while twenty-one said that they were not adequate.

In order to improve the shopwork program in the school the

instructors gave first priority to the extension of facilities--forty checked this shortcoming. To improve the content and offer more extensive courses was checked twenty-three times and procuring better qualified staff was checked by twelve people. Other suggestions included making it possible for average and above average ability students to take shopwork; follow a more intensive counselling and orientation program, as only about five percent of the students who graduated did work that they learned in the shop; establish definite curriculum guidelines; institute an ordering system that would ensure that supplies were on hand when school started; allow more time for shop preparation; reduce class size and develop new areas with good subject penetration in each area, and provide for more coordination between Division III Industrial Arts and Division IV.

The best school organization (according to the returns) for offering an adequate shopwork program throughout the province was the comprehensive school. Twenty-six shopwork instructors were in favor of the comprehensive school, sixteen felt that the regional technical schools were the best, while thirteen favored the present Larger School Unit organization with its composite high schools. Two favored some combination of the three organizations, while four favored some other type of organization. One person felt that Industrial Arts should be offered in high school up to grade ten or beyond. Students would then proceed to technical schools for vocational training. Another felt that technical high schools as they existed formerly, were ideal in giving students an introduction to the trades so as to help determine the field in which they were interested.

In question six, thirty-five people stated that it would not be possible, while twenty said it would be possible to bring in the new Division IV curriculum into the present school organization. Over three-quarters of the negative responses to this question stated that it would be impossible to bring in the Division IV curriculum because of the lack of facilities, properly qualified staff and necessary equipment. Furthermore, the cost would be prohibitive under the present organization because very few centres had enrollments large enough to warrant the expenditures on the necessary expansion. Much more centralization would be necessary before the expansion took place. The staff problems would have to be taken care of as well. Many of the present staff would require further training to become skilled in the technologies outlined in the Division IV curriculum. Journeymen would have to be recruited and salaries would have to be raised in order to attract them into the teaching field. Another view expressed was that the technologies of Division IV were too complicated and only the better students could handle them. Since they could not use them as credits for university entrance these students would be forced to stay with the matriculation courses to ensure getting the necessary credits.

In the next question, dealing with suggestions as to what had to be done so that the Division IV program could be fully instituted in the schools, proved to be, in many cases, the opposite of question six. It was felt that before such a program could be brought in, facilities had to be extended, qualified staff secured and much equipment purchased. First of all the enrollment had to be increased to warrant the expenditures that would be necessary. Some felt that students should be given

enough training in the vocational education areas so as to acquaint them with these areas and then they could proceed to the Technical Institutes in Saskatoon or Moose Jaw. This implied that the entrance regulations to these Institutes would have to be relaxed so that students could enroll.

In the final question, which requested comments regarding the assessment of the vocational education program, several instructors repeated comments that were made earlier; namely, lack of facilities, qualified staff, equipment, and sufficient enrollment to warrant expenditures. Several individuals expressed concern with the program as it was because it was not clearly defined. The first prerequisite for the program would be to finalize and to implement a definite set of guidelines and a curriculum for the technical-vocational programs. It could not hang in the air as it was now. Furthermore, there was a lot of confusion amongst teachers as to the objectives of vocational education. Some taught it as an exploration of the different fields, while others taught skills as a preparation for a definite trade. This viewpoint seemed to divide the instructors into two camps, those who were against the program as opposed to those who favored it, and those who felt the program should be set up so as to teach definite trades, as opposed to those who maintained that vocational education should be part of general education where students only explored certain fields. Some felt that high schools had a responsibility to students in terminal courses and should give them some marketable skill in practical fields. Opposition to the program came from those who felt that it was not defined clearly enough, that it was too frilly

and did not give students sufficient background for a field of work. One suggestion was that the program be a happy medium between the Industrial Arts program and the Division IV program. The supporters of the program felt that it met the needs of all grades and students, furthermore, schools were not tied down to the program and could adjust it to meet local needs.

Some of the shopwork instructors felt that vocational education was looked upon by many education authorities and others as a second-rate course. The teaching community had not recognized this type of training and had not fully understood its value. Many teachers and principals regarded vocational education as a course for the lower ability students while the better students were expected to enroll in courses in which they were not interested. School regulations and the timetable generally catered to the academic side of a school; therefore when set up, these regulations were applied to vocational education. Such planning did not give sufficient consideration for the vocational education courses. They stated that there was a great need for extensive public relations to change attitudes in teachers, as well as parents, who regarded vocational education as second-rate education. Similarly, there was a need for more guidance to explain vocational education more fully to the students so that they would have definite goals when choosing vocational classes.

There was also a great need for more practical teacher training courses, where teachers would be immersed into a situation similar to the one they would meet in schools. An internship program would also

be helpful. This could be carried further, with students spending time in actual job situations.

Summary

Shopwork instructors had lower qualifications than other vocational education instructors. Out of sixty-one shopwork instructors, seventeen had a degree, and seventeen had journeymen's papers. The remaining instructors had lesser qualifications.

The shopwork program was in a period of transition. As yet very few schools had adopted the new program. Because of the technical nature of the new courses and the need for extensive facilities for the new program, the instructors felt that it would not be possible to move into the new program very soon. The facilities would have to be extended and properly qualified staff would have to be trained or acquired elsewhere. Until that was done, students would not receive an adequate background in any program in which they were interested.

Almost half the shopwork instructors favored the comprehensive school organization, in order to provide adequate training for students. Coupled with this, some method of increasing the enrollment in these schools would be necessary; otherwise, expansion would not be feasible.

The shopwork could also be improved by clarifying its aims and objectives. Opinions were divided as to whether the program should prepare students for a job or whether it should be part of general education. There was no clearly defined majority for either viewpoint.

The general public, including many teachers and administrators, looked upon shopwork as a course for mediocre students. Consequently, students reluctantly enrolled in shopwork courses and timetables catered

to the academic subjects. Such attitudes had to be changed through more extensive public relations and through better counselling services among students.

III. THE HOME ECONOMICS QUESTIONNAIRE

Ninety-three home economics questionnaires were sent out to teachers in the schools chosen by the superintendents. Eighty-five instructors returned completed questionnaires, for a percentage of ninety-one.

The experience of these teachers ranged from no years to twenty-one years. Table XIII shows the distribution. This distribution differed from the distribution of teachers of other vocational education subjects in that it was more concentrated at the end of less experience. Other distributions seemed to spread out more toward the upper end of the scale. This discrepancy could be attributed to the fact that women teachers did not stay in the profession as long as men teachers.

TABLE XIII

EXPERIENCE OF HOME ECONOMICS TEACHERS IN THE STUDY

Years of Experience	No. of Teachers
No years	13
1 to 5	45
5 to 10	20
11 to 15	6
15 to 20	1
20 to 25	1
Total	84

The home economics instructors appeared to be fairly well qualified as compared to instructors in other fields of vocational education, with the exception of vocational agriculture. There were seven home economics instructors who had no training at all plus two others who were teaching home economics with only grade twelve home economics to their credit. Twenty-six home economics teachers had a degree in home economics, with five of them having a B.Ed. as well. Three others had a B.Ed. with a home economics major. Fourteen teachers had between five and ten home economics classes from a university, while twenty-one had below five home economics classes. Eleven of the teachers had teacher training in England which included training in home economics, domestic service, or some other specialist training. The teacher training was usually of three years duration. One had specialist training in various phases of home economics in the Netherlands, and one had a permanent first class certificate.

Of the eighty-six instructors reporting, thirty-five were full time home economics teachers, while twenty-four taught home economics between seventy-five and one hundred percent of the time. There were seventeen teachers spending between fifty percent and seventy-five percent of the time in teaching home economics, seven, between twenty-five and fifty percent, while three teachers spent less than twenty-five percent of the time in teaching home economics. The above bears out the fact that many teachers were teaching outside their special area, a factor that often contributed greatly to the difficulty of procuring necessary staff for the home economics department.

The most common grade combinations to which home economics was

taught were grades eight to twelve. Thirty-four schools reported teaching home economics to these grades, while twenty-six taught it to grades nine to twelve. There were four schools teaching home economics to grades seven to twelve and seven teaching it to grades ten to twelve. The remaining thirteen schools had various combinations. One of the above schools reported having first and second year terminal courses, another school had a special class at the grade eight level, plus two levels below grade eight, and another had a cooperative school-work training program.

Because of the transition period and the apparent dissatisfaction with the old course that was still in existence, there was a variety of combinations of courses used throughout the province. Table XIV gives a distribution of the different courses or combinations that were used in the various grades throughout the province.

Where home economics was taught at the grade seven and eight levels it was compulsory, with the exception of one school. Fifty-six schools out of seventy-six reported that home economics was compulsory for grade nine classes. Sixty-six schools out of seventy-eight stated that home economics was not compulsory in grade ten. In grades eleven and twelve all schools but one in grade eleven and two in grade twelve reported that home economics was not compulsory.

All students in grades seven, eight, nine and ten could earn one credit in home economics with the exception of two schools that stated that they allowed two credits in grade ten. In grade eleven there were

TABLE XIV

HOME ECONOMICS COURSES FOLLOWED IN VARIOUS SCHOOLS
IN THE PROVINCE OF SASKATCHEWAN

Course	Grade					
	7	8	9	10	11	12
Division III Program		43	39			
Adaptation of Division III Program	2	2	9			
Bulletin D - 1957		1	16	37	53	61
Modification of Bulletin D - 1957			5	14	16	10
Home Economics - 10				14		
Modification of Home Economics - 10				10		
Own Curriculum	2	3	7	14	6	2
Total	4	49	76	79	75	73

fourteen schools that made two credits available and the rest (51) gave one credit. In grade twelve, thirteen schools offered two credits, one school offered three credits and the rest (51) offered one credit.

The returns regarding enrollment showed that in grades seven to ten student enrollment was high. In grades eleven and twelve the enrollment decreased considerably, particularly in grade twelve. In grade eleven there were eleven schools that had enrollments below ten and thirty-two with enrollments between eleven and twenty. In grade twelve there were thirty-seven schools with enrollments between one and ten and twenty-four schools between eleven and twenty. An explanation for the sudden drop was that grade twelve students often dropped home economics in preference for other sciences that they would need for future education plans.

Generally speaking, students of differing abilities enrolled in home economics. Thirty-five schools stated that they had above average, average and below average students taking home economics. There were twenty-six schools that reported having average students and sixteen having both average and below average students. Several comments were made regarding these students. In schools where the body of students was of varying ability, quite frequently home economics was compulsory at the grade eight, nine and ten level. Where there were both average and below average students, the average students were in the grades below grade twelve. Many of the grade twelve students had dropped home economics at the end of grade eleven, and pursued subjects that were required for university entrance. This left the below average students in grade twelve home economics.

The returns showed that most students took home economics for a credit in the matriculation course. In this category twenty-three schools stated that 100% of the students took home economics for this reason, another twenty-three schools said that between seventy-five and one hundred percent took it as a credit, fifteen schools reported between fifty and seventy-five percent, eight between twenty-five and fifty and only four below twenty-five percent. The next two categories showed a very low percentage. Nineteen questionnaires reported below twenty-five percent and seven between twenty-five and fifty percent of their students took home economics as a basis for entry into Technical Institutes and further training. In thirteen questionnaires it was stated that below twenty-five percent, and two between twenty-five and fifty percent of the students took home economics as training for employment. It was interesting to note that in thirty questionnaires it was stated that students took home economics strictly because they were interested in it and enjoyed it, or were taking it because they wanted to have some preparation for homemaking.

To the question, whether 1957 Bulletin D, gave students an adequate background for further education or home life, thirty-nine said it did while thirty-six said it did not. The most often quoted reason (approximately half the teachers) was that the course was very much outdated and not really functional in today's society. It did not keep up with the changed role of the homemaker. Topics such as consumer education, family management, new fibres, restaurant meals and modern methods of preparing foods were not included in the course. Several people felt there was too much repetition of the same material in the

different grades. Others stated that the course had too much theory and not enough time was left for practical work, while some said that the subject field was too wide to be covered efficiently; in other words, there was not enough specialization.

To find out the status of facilities, the question whether the facilities in the schools were adequate enough to carry out the program suggested in the 1957 Bulletin D; thirty-four stated that they had adequate facilities for all home economics courses, twenty-three said that there were enough facilities for basic home economics only, and twenty-five said that facilities were inadequate to carry out the program. As a result of the above appraisal, forty-eight teachers said that facilities had to be extended in order to improve the home economics offerings in their school. Forty felt that the content had to be improved and the courses made more extensive. Twenty-one said that more staff and better qualified staff in many cases, had to be recruited, while twenty instructors gave a variety of ways of improving the home economics course. The most important improvements that were suggested were that smaller classes were needed because they were too large for the facilities; that more specialists were required in definite areas such as foods, cooking or sewing, so that home economics would become an equal of the academic subjects; that longer periods be provided on the timetable for home economics; and that courses be offered where students could choose either food, clothing or other areas according to their interests. In addition to these, it was stated that guidance counsellors and other teachers had to cooperate more, regarding the content of the course in order to avoid repetition of

similar material in other subjects taught in the school. Other improvements mentioned were that boys should be allowed to take home economics since many of them did enter cooking and baking fields; that more public relations had to be undertaken to encourage the better student into home economics; and that the Department of Education employ a resource person to be available to give assistance to home economics teachers in the province.

According to the returns, the best school organization for offering an adequate home economics program throughout the province was the present Larger School Unit organization. Thirty-two instructors were in favor of this type of organization. They felt that this system reached more students and gave more individual attention to them. There were thirty instructors who favored comprehensive schools and nine who favored large regional schools. Several people felt that the latter two organizations were more suitable for people with strictly vocational plans.

In answer to question six, twenty-seven people felt that facilities in their school were adequate enough to bring in the 1967 Division IV program as presently forseen. Forty teachers said that it was not possible, because there was a lack of facilities, a lack of qualified staff, and minimal enrollments. This view was expressed by thirty-one home economics teachers. Other reasons given were really suggestions and are included in the summary of question seven.

Question seven asked for suggestions as to what could be done to bring in the full Division IV home economics program. The most often stated suggestions for improvement, in order of frequency, were the

following: improve facilities, get more staff and better qualified staff, provide a proper timetable with longer periods for laboratory work, have a smaller teacher-pupil ratio, provide leeway for teachers to teach more detail where they felt it was necessary, and give the above average student a chance to enroll in home economics.

In the final question, the home economics teachers were given an opportunity to make any other comments they wished, as an assessment of the home economics program as it existed. Fifty-five teachers made comments. Besides the criticisms offered in previous sections of the questionnaire several more were added in this section. Sixteen home economics teachers expressed concern with the Home Economics 10. The general opinion was that the course did not appeal to the girls because there was no practical work in it. Furthermore, the grade ten girl was, as yet, too immature to handle the course. The course was far too technical and advanced for students of this age level. Because so little practical work was done, many students would lose interest in home economics and drop out of it. It would be more valuable at the grade twelve level. Students would become bored with one main learning area for ten months; more value would be derived from having a diversified course in one grade. Another criticism was that a teacher would require a psychology major to be able to teach the course. A drastic change was necessary if the course were to remain at this grade level. Satisfaction was expressed with the Division III curriculum; it appeared to be quite satisfactory and offered delightful possibilities.

The grade twelve June departmental examinations were a threat to the student and the teacher as well. This view was held by five teach-

ers. First, the teacher was forced to hand out information in order to prepare the student for the exam. There was no opportunity to teach in the true sense and to allow for individual differences. The exam stressed theoretical knowledge only; it was necessary to have a practical assessment of the student's work. Furthermore, since mostly lower ability students enrolled in home economics, and since they would not be proceeding to university work, emphasis should be placed on different sections of the course, mainly practical work, so as to equip them for a future in homemaking or related work.

Ten teachers felt that the home economics course was discriminating against the male student in high school. Because many men had an aptitude for cooking and other fields related to home economics, it could be a most interesting and valuable course for boys as well as girls. The course would not necessarily mean a preparation for a vocation, although in many cases it could be, but simply as family preparation. Many difficulties would have to be overcome to bring this about. A better timetable and a great deal of work in public relations was needed to fight the "cooking and sewing" image and to break with tradition that home economics was for girls only. This involved much work among present teachers, administrators, school boards and parents. Home economics should be accepted as a valid subject area, and as a science. It should be classified as such by all educators. Furthermore, home economics did provide a proper background for the art of living a full and rewarding life. At present, many administrators saw only those courses that were needed for college entrance and not for interest, therefore they streamed only the lower ability student into

home economics.

Three teachers stated that the teaching of home economics was hampered because of poor communication between home economics teachers in the province. Of particular importance was the lack of communication between teachers in rural areas and those on the curriculum committee. The lack of communication was evident from the questionnaire returns as well. Many teachers did not appear to be informed of the changes that were taking place nor of the proposed changes in home economics. Some teachers had not seen, nor were they aware of the tentative curriculum for grade ten. This would suggest that communication broke down between the Department of Education and the school, or between the administrator of a school and the home economics teacher.

Five teachers reiterated the criticism that home economics was outdated and that it was a "hodge-podge" of useless information. There should be emphasis on work simplification and speed in order to cater to the career girl or the busy housewife.

The criticism of the overloading of schedules and courses was also expressed. Many teachers had overloaded schedules. Courses included too many topics, leaving no time for teachers to expand those topics that would suit the students involved. Furthermore, it left no time for enrichment, nor for taking field trips in conjunction with the course.

Other comments expressed by individual teachers were that there was no provision made for a terminal course for those who left school at the end of grade ten. Properly qualified teachers, not only from the academic point of view, but from the point of view of interest and

personality, were necessary in order to make a course successful. A good teacher could modify any course to suit needs, whereas a poor teacher could ruin any program.

Summary

In summary, the home economics program was criticized for being out of date. It would have to be updated to be of more value. This was being done with the initiation of the grade ten tentative program that was authorized in July, 1968. New programs in grades eleven and twelve would be authorized in successive years. The new grade ten program was mainly criticized for the lack of practical work, and for the overemphasis of the theoretical and the technical aspect of the course. It was felt, in approximately half the questionnaires, that the new proposed course was not going to fulfill the needs of the students enrolling in home economics. Facilities were inadequate in 75% of the schools in order to carry out the 1957 program. Therefore, if home economics was to be improved, the facilities would have to be extended, better qualified staff procured and the course would have to be improved. Approximately half the teachers answering the questionnaire felt that the present Larger School Unit system was best because it would reach more students. Nearly the same number of teachers felt that the Comprehensive School was good. There were only a few people who favored the Regional School. It was felt that they were not as readily available to all students and would serve the purpose of vocational education for only a small number of students.

IV. BUSINESS EDUCATION (COMMERCIAL) QUESTIONNAIRE

Eighty-nine business education (commercial) questionnaires were sent out to teachers in the schools where commercial subjects were taught. Seventy-nine completed questionnaires were returned for a percentage of eighty-nine. Two questionnaires had information on all the commercial teachers in the school. This information was included in the summary below.

The experience of the commercial teachers is shown in Table XV.

TABLE XV

EXPERIENCE OF COMMERCIAL TEACHERS IN THE STUDY

Years of Experience	No. of Teachers
No Years	18
1 to 5	33
6 to 10	18
11 to 15	7
16 to 20	6
21 to 25	2
Total	84

One teacher did not enter his experience.

The training of the commercial teachers in the study was as follows: sixteen had professional certificates, eight had a B.Ed. with a commerce major and thirty-one had a business course with university training. Most of the teachers with a professional certificate had two degrees plus some commercial training. This consisted of either several classes at a university, or a business course after their degree. The remaining teachers had a variety of training. There were nine who had

training in a business college only; some of these had office experience. The business course usually gave graduates a probationary teaching certificate. There were four teachers with no training outside of their high school commercial course. Two of these had some experience in secretarial work. Three others were teaching with short courses in adult education or a summer class at a business college. The remaining fourteen teachers had some commercial training with a Standard A Certificate, or high school commercial courses with university training, Standard A or B certificate with business college, or a Technical Commercial Certificate, or a Professional B Certificate.

The time spent in teaching commercial subjects by the teachers answering the questionnaire was as set out in Table XVI.

TABLE XVI

TIME SPENT BY TEACHERS IN TEACHING COMMERCIAL COURSES

Time Spent (in percent)	No. of Teachers
100	38
75 to 99	21
50 to 74	14
25 to 49	7
below 25	4
Total	84

Most of the schools taught commercial to grades nine to twelve or ten to twelve. Forty-seven were in the first category and eighteen in the second. The remaining schools taught commercial to the following grade combinations: five schools taught commercial to grades eight

to twelve, four schools to grades nine and ten, two schools to grades nine, ten and eleven, two to grades ten and eleven and one school taught it to grade nine alone.

The courses used in the different schools were as shown in Table XVII.

TABLE XVII
THE NUMBER OF SCHOOLS USING THE DIFFERENT
COMMERCIAL PROGRAMS IN GRADES 8 TO 12

Grade	8	9	10	11	12
1957 Bulletin D		46	49	38	34
1957 Course Altered		5	4	4	4
1967 Division IV		1	17	19	19
1957 Bulletin and 1967 Division IV Together (transition period)			11	12	12
Teachers Own Curriculum	3	4	1	1	1

The returns showed that many schools were in a state of transition, consequently, the 1967 Division IV curriculum was not completely adopted. The 1967 Division IV curriculum outlined courses for grades ten, eleven and twelve, therefore, most grade nines were still following the 1957 Bulletin D, in order to give students a general introductory course in typing.

Credits in business education (commercial) varied from school to school. The offerings depended on the size of the school and how completely the school had gone into the 1967 Division IV program. Table XVIII summarizes the number of credits offered by the schools.

The comprehensive schools offered the largest number of credits. Many of these schools were still in a transition period and more credits

TABLE XVIII

THE NUMBER OF SCHOOLS OFFERING DIFFERENT NUMBER OF CREDITS
IN BUSINESS EDUCATION (COMMERCIAL)

Grade	8	9	10	11	12
1 Credit	1	38	29	28	26
2 Credits		12	38	28	27
3 Credits		2	8	9	9
4 Credits			1	3	2
5 Credits				4	3
6 Credits				0	1
7 Credits				1	1

would be offered as the program was expanded.

The number of schools where different commercial subjects were taught in the different grades is summarized in Table XIX.

TABLE XIX

THE NUMBER OF SCHOOLS TEACHING THE DIFFERENT COMMERCIAL SUBJECTS

Subjects				
IX	Business Essentials - 21	Typewriting - 54		
X	Recordkeeping - 47	Typewriting - 60	Shorthand - 8	
XI	Bookkeeping - 38	Typewriting - 57	Shorthand - 12	
XII	Bookkeeping - 33	Typewriting - 54	Shorthand - 11	

The new Business Education program had not been adopted as yet by many schools. Some of the larger centralized schools and the city schools were using it to some extent. Most of these schools, too, were in a transition period and were still following parts of the 1957 Bulletin D, with several subjects of the 1967 Division IV curriculum. The 1967 curriculum was meant to be tested out; therefore its use was not compulsory until it was finally authorized after revisions had been

made. Only two of the larger schools had a full range of subjects as suggested in the 1967 Division IV curriculum.

As was the case in the other vocational education subjects, so it was in business education, that students of average and below average ability enrolled in the commercial subjects. Twenty-nine instructors stated that they had average ability students, eight had below average and eighteen had both average and below average ability students. Students were directed into these courses if they were unsuccessful in the academic subjects. The more able students were forced to pursue those subjects that were required for university entrance. Twenty-one schools said they had students of all abilities in their commercial courses; this was due to the fact that commercial subjects were compulsory in the lower grades.

The second section of the questionnaire requested teacher opinion on the commercial program as they saw it.

According to the teachers, there was adequate time provided for teaching the commercial subjects. Sixty-four stated that adequate time was provided in the curriculum guide, while only thirteen stated that there was insufficient time. A few teachers qualified their answer by stating that there was enough time in grades nine and ten, but not for grades eleven and twelve.

Question two explored the area of whether the commercial course offered in a particular school, gave students enough background to continue in a chosen field, whether it be a job or further training. Forty-two teachers felt that students did get enough background and several of these stated that their students did find jobs quite readily.

or if they proceeded to a business college they completed their course there more quickly. Thirty-four teachers said students did not get an adequate background. Of these, twenty-five said that there were not sufficient areas covered in the schools, and often, those that were covered were not given extensive treatment. Ten others said that the background given students was inadequate because of insufficient equipment to be able to offer more courses. A few stated that their aim was to provide some training for personal use, rather than preparation for a job.

In forty-three of the schools teaching commercial subjects, the facilities were adequate to carry out the commercial program as suggested in the 1957 Bulletin D. In thirty-three schools the facilities were inadequate. Of this number, thirty stated that there was a great lack of modern equipment, specifically, modern business machines necessary for teaching an adequate program. Six of these teachers stated that lack of properly qualified staff and too small an enrollment were drawbacks as well. It was felt that the new program was meant mainly for the larger city schools, where enrollments warranted the expansion.

The returns to question four were identical to number three, except that they were more heavily inclined toward the negative than in question three. Fifty-four people reported that facilities were inadequate to carry out the program outlined in the 1967 Division IV curriculum. Fifteen stated that facilities were adequate. Of the fifty-four who stated that facilities were inadequate, forty-eight stated that much more equipment, such as modern business machines, data processing

and merchandising equipment would be needed to properly teach the 1967 Division IV program. Ten teachers stated that their school lacked properly qualified teachers and enough students to bring the program into their present schools.

Most of the teachers favored the comprehensive school organization for the province. Thirty teachers felt that this organization was the best; twenty-four stated that the regional technical school idea was best, and eighteen felt that the present Larger School Unit organization would serve the largest number of students.

The 1967 Division IV curriculum in business education was being used very little as yet. Several teachers had not seen the curriculum, many were using small portions of it only, while a number were adopting it gradually. Forty-seven commercial instructors stated that they felt they could not bring in this new program into their present school set-up, while thirty-one stated they could. The main reasons were the lack of facilities and equipment, lack of properly qualified staff and insufficient enrollment to warrant expenditures on the equipment and facilities. Furthermore, because of the size of the schools, it was impossible to schedule many vocational education courses because timetabling did not allow it. Several people stated that it was possible, but only on a limited basis, as enrollment warranted it.

In order to institute the Division IV program in business education, all the shortcomings mentioned above would have to be remedied. More room, equipment and staff were the prime requisites. This alone was not a solution, since there was still the lack of necessary enrollment. More centralization was suggested. The enrollments would

increase and facilities would be easier to procure, since a larger area would be served. Others felt that the program as it existed was adequate enough; that it did serve many students, and that it prepared them for some jobs, or gave them a good basis for further training. Some of these people felt that it was more feasible to send students to commercial schools, if they wanted intensive training, rather than to provide the necessary facilities, with the accompanying expenditure.

A variety of worthwhile suggestions were made in the final question. Since the variety was quite extensive no attempt was made to categorize these numerically. A general summary was made to include as many of the suggestions as possible. The main comment or criticism of the 1967 Division IV curriculum was that it was good but not for the small school where facilities were not adequate enough for study of the areas suggested in the course. Some felt that there was a need for a different program for the smaller school. There were others who felt that the program as set out was valuable to the small school, even if partially implemented. These people stated that a partial program of typewriting, bookkeeping and shorthand was helpful in giving students a start in employment. Follow-ups on these students revealed that these students were performing adequately on the job. Furthermore, if these students chose to enroll in a business college, they completed their training much sooner than others who had no high school commercial training. For this reason, one instructor felt that regional schools were not really the answer. These schools did not warrant the expenditures that were needed; that it would be much more realistic to improve existing facilities in the composite schools. Such facilities

would reach more students who would find the basic commercial subjects such as typing, bookkeeping and shorthand useful, whether it were for a career, a help in attaining life's work, or a supplement to ordinary, present-day life. Another criticism of the Division IV program was that it took commercial subjects away from the grade nine level. Under the former regulations students were able to get two years of typing in grades nine and ten. This helped them in the ways mentioned above. Because of academic pressures to meet university entrance requirements in grades eleven and twelve, students would drop commercial subjects in these grades and have only one year of training, since it was no longer offered in grade nine under the 1967 Division IV program.

Several people criticized the university entrance requirements because they did not allow students to use business education courses for these requirements. These requirements deprived the good student from enrolling in some of the more practical commercial courses. Administrators, quite often directed only the below-average student into the commercial field, or timetabled in such a way, that it made it impossible for good students to enroll in it.

Several instructors suggested some kind of on the job training in conjunction with the formal education in school. Such a plan could run for a week or two at a time, or once or twice per week over a longer period of time. Students thus placed would gain practical experience and would benefit, in that selection of future courses would be more purposely chosen.

Other comments regarding the program were that there were too

many courses outlined for study. There was a need for a continuing committee for curriculum making and revision in business education. Another idea was that less stress should be placed on the year level that a specific course should be studied. It was felt that a grade twelve student should be able to take first year typing or another appropriate course and get credit for it in grade twelve.

Summary

In a general summary of the ideas contained in the commercial returns, it was noted that there were three main shortcomings in commercial education; namely, lack of proper facilities, insufficient staff to properly carry out the program, and insufficient enrollment to expand the program to the proportions suggested in the 1967 Division IV curriculum. The course seemed to have the city school in mind and not the smaller school in rural school units. Before such a program could be brought into full operation in all areas of Saskatchewan further centralization was necessary to provide the enrollment, the financial requirements needed for the expanded facilities, and more qualified staff. A small group of instructors expressed reservations about the value of extending present courses. They felt that a good job was being done by the small school with its limited offerings. It was unrealistic to go into great extension of facilities when sufficient training could be had in these schools. The more extensive and specialized training should be provided by special commercial or business colleges. Many favored the idea of a more general education with commercial subjects being placed on the same level as academic sub-

jects, so that they could be used as credits for entrance into university.

V. VOCATIONAL AGRICULTURE QUESTIONNAIRE

Of the twenty-three vocational agriculture questionnaires that were sent out, nineteen or eighty-three percent were returned..

The questionnaires revealed that the teaching experience of the vocational agriculture instructors varied from no years to nine years experience. Table XX is a resumé, of the results to the question of experience.

TABLE XX
NUMBER OF YEARS OF EXPERIENCE OF VOCATIONAL
AGRICULTURE INSTRUCTORS

Years Experience	No. of Instructors
None	5
1	2
2	2
3	3
4	2
5	3
6	1
7	1
Total	19

On the question of training, eighteen vocational agriculture teachers had a degree. Six teachers stated they had a B.S.A. and a B.Ed., four teachers had a degree in agriculture plus a diploma in education and seven teachers stated they had a degree but did not

specify the kind. One of the teachers stated that "all vocational agriculture instructors must have a degree in agriculture (B.S.A.), according to the Agrologist's Act." One of the teachers had an M.Sc. in Agronomy, while the last one had farming experience plus a year of training in the College of Agriculture.

There was a variety of grade combinations in which vocational agriculture was taught. Nine schools taught it to grades nine to twelve, while four schools taught it to grades ten to twelve. The following combinations were found in one school each: grades eight to twelve, nine and ten, nine to eleven, ten and eleven, ten, and eleven.

In reply to the question on the percentage of time spent in teaching vocational agriculture, ten teachers stated they taught 100% of the time, five teachers for 75% of the time, three teachers for 50% of the time while one taught less than 25% of the time (this was in the traditional agriculture course).

There seemed to be considerable variation as to the courses followed in the different schools. Four schools reported they followed the Division IV Vocational Agriculture Curriculum of the Department; four schools followed the proposed revised curriculum of October, 1962; and two schools followed the Saskatchewan Curriculum Bulletin D plus the Vocational Agriculture proposed curriculum. The following courses were reported in one school each: a combination of the 1962 and 1967 Division IV program, the revised curriculum for grades nine to twelve plus the Division 3 curriculum. Three teachers did not report any course.

Enrollment in the vocational agriculture courses appeared

quite distributive. Table XXI summarizes the enrollment by grade and by schools.

TABLE XXI
ENROLLMENT IN VOCATIONAL AGRICULTURE BY SCHOOLS

School	Grade				
	8	9	10	11	12
A	--	--	23	20	11
B	--	42	26	9	10
C	--	5	25	13	8
D	52	34	31	28	11
E	--	--	--	21	--
F	--	11	14	12	3
G	--	22	23	--	--
H	--	--	16	12	17
I	--	17	15	18	2
J	--	24	28	13	1
K	--	9	14	2	11
L	--	--	24	20	--
M	--	--	22	14	5
N	--	120	10	11	--
O	--	--	23	38	18
P	--	7	10	4	4
Q	--	25	33	9	2
R	--	--	10	--	--
S	--	53	28	18	7

Credits in vocational agriculture were distributed as shown in Table XXII.

TABLE XXII
THE NUMBER OF SCHOOLS OFFERING DIFFERENT NUMBER OF
CREDITS IN VOCATIONAL AGRICULTURE

Grade	8	9	10	11	12
No Credits	1	1	--	--	--
1 Credit		11	13	4	2
2 Credits		1	5	10	11
3 Credits				3	1

The question regarding the reasons for enrollment in vocational agriculture was quite inconclusive. It appeared that more students enrolled in vocational agriculture in order to get credit for matriculation than for any other reason. Four schools reported that approximately 25 percent of their students enrolled in vocational agriculture for matriculation purposes. Three schools stated that between 25 to 50 percent of their students enrolled for the same purpose, three schools reported 50 to 75 percent and three more stated that 100 percent of their students enrolled in order to obtain a credit for matriculation. In the field of further training, ten schools stated that approximately 25 percent of their students enrolled in vocational agriculture in order to prepare themselves for further training. Three schools reported in the 25 to 50 percent range, while two schools stated that 50 to 75 percent of their students used vocational agriculture as an introduction to further training. It was interesting to note that seven schools stated that approximately 25 percent of the students were

taking vocational agriculture as a preparation for farming. Another seven schools reported in the 25 to 50 percent range, and one school in each of the 50 to 75 percent and 75 to 100 percent ranges as a preparation for farming. There were six schools that reported students in the 25 percent, and 25 to 50 percent ranges who were interested in vocational agriculture for employment in agriculture related fields, students who found other courses too difficult, and those who desired some shopwork training, since no other shop courses were offered.

Fifteen schools reported that the vocational agriculture course was providing an adequate background for students interested in agriculture. Three schools stated that the course was not adequate. In these cases the reason put forth was that there were no vocational agriculture shops and this limited the amount that could be taught in the field of mechanics.

Many suggestions were offered as to what could be done to improve the vocational agriculture program in the schools. One of the most often stated shortcomings was the lack of facilities. Eleven schools stated that shops had to be built, or more laboratory equipment acquired, or a special classroom provided for vocational agriculture teaching. Other suggestions for improvement were: to give credit for vocational agriculture for university entrance, to get rid of the stigma that vocational agriculture was just for the below average students by recognizing it as a credit on the same level as other subjects, and allowing more time on the timetable for field trips in conjunction with the course. Several teachers stated that larger enrollments were

necessary so that the vocational agriculture course could be offered in its entirety. More centralization would have to take place so that there would be a larger student body from which to draw people into vocational agriculture. This would allow teachers to teach their specialty and not have to teach such broad areas as they must at the present time.

In answer to the question: What is the greatest drawback in the teaching of vocational agriculture?, the statement that was made most often dealt with the lack of recognition of vocational agriculture as a subject in its own right. Beginning with the local school situation and going right to the University or Departmental level, vocational agriculture was given "second-rate billing." The following quotations from the questionnaires bear this out:

Ignorance on the part of the teaching staff regarding the curriculum and philosophy of vocational agriculture. It is generally assumed that the course is intended only for boys who will return to the farm, and that the course is like the old Grade 11 Agriculture course--an easy or spare credit. Time tabling. The majority of the good students are lost to vocational agriculture because they are required to take certain subjects to meet university entrance.

Students are encouraged to pursue academic courses whether they are capable of handling them or not.

Not enough recognition by university of classes (in vocational agriculture) as credit for university entrance.

The greatest drawback is that parents and students are uninformed as to the course of study. Many students who are interested in agriculture don't take the course and many who do, take it because they think it's an easy subject.

Getting students who are "dumped" into vocational agriculture because they are not "bright" enough to take academic subjects.

Can get mainly the lower class students as far as ability goes.

I think they (drawbacks) exist outside the secondary school system. e.g., the present stigma attached to vocational agriculture, the mandatory subjects for post high school education eliminate many capable students from our course, regardless of their interest in agriculture.

The vocational agriculture program was outlined so that many projects were organized on farms. Farm projects, as organized, were time consuming to the teacher. Field trips were most successful on weekends, therefore this phase of the course was not conducive to the regular school day. Teachers felt some allotment should be made for this, perhaps timetabling would have to be revised.

Approximately one quarter of the instructors stated that because of the importance of agriculture in our society, it was necessary to do a better selling job of vocational agriculture. Some felt that it should be taught earlier in high school and possibly even in the elementary school. Concern was expressed that the lack of interest on the part of the administrators within the schools, the Department of Education and the University was evident. The above should make vocational agriculture more readily available to all students through more advantageous timetabling and recognizing it as a credit for further training.

Summary

Vocational agriculture was not taught too extensively throughout the schools of Saskatchewan. Only twenty-three schools of the one hundred fourteen that were contacted taught vocational agriculture--a small percentage for an agricultural society.

The vocational agriculture instructors were better qualified in their specialty than any of the other vocational education teachers.

With one exception, they all had a degree. Where the subject was offered, there appeared to be a good enrollment in it. Without doubt a tradition had been built up in these areas and the course was recognized as necessary and useful. Approximately one quarter of the students in several schools enrolled in vocational agriculture to help prepare them for farming. Others stated that students were taking vocational agriculture because they were interested in it, or that the training would help them to get employment in fields related to agriculture.

Vocational agriculture suffered for the same reasons as were expressed in other vocational education areas. Facilities were lacking, especially in the practical areas of the course. Enrollments were too small to warrant large expenditures. Vocational agriculture was treated as a second-rate subject by teachers, parents and administrators. It was given little consideration on the timetable and students were guided into it only as a last resort. Such an attitude had to be corrected, especially when one considered the fact that we lived in an agricultural environment.

Vocational agriculture required special consideration because part of the program consisted of farm projects and after school work. It was necessary to make compensation for the out-of-classroom work. This in essence could be surmised as laboratory work and should be well planned, by providing the vocational agriculture instructor necessary school time to prepare for this phase of the program.

CHAPTER VI

REVIEW OF THE PROBLEM, FINDINGS AND CONCLUSIONS, AND RECOMMENDATIONS

I. REVIEW OF THE PROBLEM

With the advent of the space age and the pace of technological change in our society, more and more attention has been given to training programs and training institutions that are able to educate necessary personnel for today's needs. Governments at various levels both within and outside the province of Saskatchewan have increased their activities to provide facilities that would help to alleviate the shortage of skilled technicians and tradesmen. Technical institutes, vocational centres, vocational high schools, composite high schools and comprehensive schools have been built and are being built for these purposes. Nevertheless, increased pressure and stimulation are needed in order to build a program and facilities that would keep pace with today's economy and the rate of technological change.

The purpose of this study was threefold. The first purpose was to make an historical survey of vocational education from 1950 to 1967. In so doing, trends regarding federal aid for vocational education in Saskatchewan, the kinds of programs that have been offered, the enrollment in vocational education and the kinds of schools offering vocational subjects would be established. This survey was done in Chapter II in

conjunction with the review of literature. The second purpose was to make an assessment of the vocational education program in Saskatchewan. A questionnaire was sent to principals and vocational education instructors, in order to evaluate the program. The final purpose of the study was to make a limited comparison of the programs in Saskatchewan and Alberta. Alberta's program is considered to be one of the better programs in Canada; therefore, the comparison helped to determine the adequacy of Saskatchewan's program.

For the historical and the comparative aspects of this study, government documents and publications, acts, books, and theses were used. Primary sources were used wherever possible.

The questionnaire study, consisting of five different parts, was used to make an assessment of Saskatchewan's vocational education program. Each part was sent to the specific person connected with the program; namely, the principal, and the instructors of shopwork, home economics, business education (commercial), and vocational agriculture. The questionnaires were sent out to one hundred fourteen principals, sixty-nine shopwork instructors, ninety-three home economics instructors, eighty-nine business education (commercial) instructors and twenty-three vocational agriculture instructors. The results were summarized and placed in tables wherever possible. Some of the comments were taken verbatim and listed in the summary. No rank order was attempted in writing down these comments.

II. FINDINGS AND CONCLUSIONS

This study points out a high agreement among principals and the

vocational education instructors that the program had many deficiencies. There was a lack of facilities, equipment, and staff to carry out an adequate program.

The respondents were in general agreement that the vocational education program in Saskatchewan did not give students an adequate background in a chosen field of study beyond high school. The instructors were evenly divided in their opinions of the adequacy or inadequacy of the program. The opinion, in many instances, was dependent on the philosophy of a particular school and on the extent of the facilities. Eighty percent of the vocational agriculture instructors said that their programs were adequate enough to give students enough preparation for a chosen field of work. The respondents were in agreement that the program was deficient because there was a lack of facilities and equipment. They also agreed that the courses lacked variety and depth. The lack of staff and sufficient enrollment to warrant the expenditure for the increased facilities was cited as another problem. It was stated that more centralization could be the answer. Others suggested that the vocational education subjects be offered on a semester system in a particular area, giving students an opportunity to commute to these centres in order to pursue the courses they chose.

There appeared to be a conflict regarding the philosophy behind the vocational education program. Some schools felt that it was meant to give students a broad experience and to arouse their interest. The education they received was to enable the students to absorb more education rather than to train them in specific skills. It simply

meant that vocational education training should be post-secondary. There should be trade schools and technical schools beyond grade twelve or even earlier. A minority opinion expressed the view that the program was adequate enough the way it was. Students were getting enough training to get a job, to discover interests and aptitudes, or to get a general orientation in areas that a student could build upon later. The general education idea was upheld by the vocational education instructors in the question on reasons for pursuing certain subjects. Over one quarter of the returns upheld this idea when they stated that the students enrolled in these courses in order to get credit for matriculation. They were not preparing themselves for a specific job.

Other drawbacks to the program were difficulties in timetabling the vocational subjects, the heavy teaching load and the belief that all students should go to university, thus leaving very few students to enroll in these subjects. University entrance requirements should be changed so that vocational subjects could be considered as credits on a par with other subjects. Similarly, entrance requirements to technical institutes should be changed, thus more students could enroll for further training.

Qualified staff for vocational subjects was difficult to get. The qualifications of the instructors appeared to be lacking. Each vocational education area, except vocational agriculture, reported that between ten and twenty percent of its staff had no training or very little training in its field of specialty. In vocational agriculture all but one of the instructors had a degree. Opinions were divided in half regarding the availability of shopwork instructors. The shortage

was most critical in this area. In home economics and business education (commercial) the ratio was two to one of people who said staff was readily available and those who said it was not. Instructors in vocational agriculture were not readily available. The problem was to locate people with trade experience and a teacher's certificate, and people skilled in the technologies. More extensive and more practical teacher training was needed to provide the needed instructors. The problem was further complicated because skilled tradesmen received better salaries in industry than in the teaching profession. In home economics, specialists in various fields were required so as to properly teach the available courses. Teachers also hesitated in applying to teach in the smaller towns because of a lack of proper accommodation. In many cases, they were asked to teach subjects outside their specialty because of the small enrollments. One sixth of the principals stated that they had no trouble getting staff. These opinions came from larger centres or schools close to university cities. The problem here was to retain the staff after they or their spouses completed their education.

According to the respondents, the comprehensive school organization was best, with the regional school being a close second. The home economics instructors favored the Larger School Unit system by a slight majority. They felt that such a system reached more students. In each case, though, more centralization was suggested so that the cost of providing facilities and equipment would be more equitably distributed.

The content of the courses also came in for considerable criticism. The 1957 curriculum was very much out of date. The material was

meaningless and uninteresting. Nevertheless, most schools were still using the 1957 curriculum, although there were some that were trying out and slowly adopting the new 1967 Division IV program. A period of transition was in progress. There were many combinations of the various courses or adaptations of these. Several respondents stated that the new technology approach at the high school level was too complex for more than half the students. This was also true with regard to the new Home Economics 10 curriculum. These subjects were too difficult for students who lacked above-average ability. The home economics instructors felt that the Department of Education should supply a resource person to give guidance and assistance to teachers in the province.

It was also felt that much public relations work had to be done to change opinions and attitudes regarding vocational education. The idea that vocational subjects were second rate and meant only for the student with low ability or the under achiever had to be dispelled. The vocational agriculture instructors listed this as the number one drawback in the teaching of vocational agriculture. As a result of this attitude regulations in a school and timetables catered to the academic side of the school. These courses had to be made equally available to the higher ability student. This in itself would dispell the attitude that vocational subjects were "second-rate".

From the comparative study of the vocational education programs in Alberta and Saskatchewan, it was found that Alberta had both an industrial arts program and a vocational education program. Students were free to elect the program they wished to study. In Saskatchewan

there was no distinction. Courses were referred to as vocational but in reality were industrial arts. Students pursued them from the point of view of interest and general knowledge rather than a preparation for further training or work. The new 1967 Division IV program was much more job oriented. Its objective was to prepare students in particular fields of work. Because the courses were highly technical, only the larger schools with the necessary facilities and staff were able to offer them. The smaller schools had to follow the 1957 curriculum or some modification of the Division IV program.

The aims and objectives of the general course in each province were quite similar. In the first place, courses were aimed at providing students with a general background and broadening their understandings. Secondly, the general objectives of each course were identical. In the vocational program, the aims and objectives were also very similar. They specifically stated that students were to be prepared for entry into employment, the apprenticeship program or the technical institute program.

In the area of articulation Alberta was more advanced. Specific steps had been taken to provide for articulation of the high school program with that of the technical institute by listing the articulated subjects. Articulation had also been provided for with the apprenticeship program. In Saskatchewan, some planning had been done to provide for articulation. Nevertheless, nothing specific had been worked out as yet.

The content of the vocational education programs in Alberta, with the exception of business education, was much more extensive than

in Saskatchewan. The industrial arts and general shopwork courses were quite similar. Home economics in Alberta had the same basic courses as Saskatchewan, but there were special courses that students in Alberta could pursue that the Saskatchewan program did not offer. The two business education programs were somewhat similar, except that Saskatchewan outlined three distinct courses that students could take, dependent on their future plans. There was a greater difference in the vocational courses. Alberta had a total of seventeen subjects that a student could take. Practically all of these were offered in each of the three high school grades. There were several others that were offered in a few areas on an experimental basis. These would be adopted if proved successful. Saskatchewan, on the other hand, had only nine different courses that were offered to students. Overall, Alberta offered a greater number and variety of courses.

In Alberta, twenty-five schools offered industrial and business education courses, another twenty-three offered business education courses only, and another seven schools with full vocational facilities were in different stages of development. Saskatchewan had only six schools offering vocational education programs, with five comprehensive schools under construction and another five in the planning stage.

Other statistics revealed that Alberta's program was different from that of Saskatchewan. Enrollments in Alberta for a four year period from 1963-64 to 1966-67 showed a steady increase while those of Saskatchewan declined. In the first year Saskatchewan's enrollment was approximately half of Alberta's enrollment but in the final year Alberta's enrollment more than tripled Saskatchewan's. During the same four year period the

percentage of the vocational enrollment of the total secondary enrollment increased, while Saskatchewan's decreased, except for the final year. The same picture is portrayed in statistics illustrating the effect of federal aid for vocational education. The federal contributions to Alberta were three times those to Saskatchewan. At the same time Alberta's expenditures on vocational education were almost three times those of Saskatchewan. The population of Alberta was not three times that of Saskatchewan. The April, 1967 estimate of the total population for Alberta was 1,483,000, and for Saskatchewan it was 955,000.¹ As a result of the greater expenditure Alberta provided almost three times the number of new student places than did Saskatchewan.

In summary, the trend in Alberta had been one of steady growth and expansion, while Saskatchewan showed a decline or was at a standstill. The federal government had made available large sums of money for vocational education based on provincial expenditure. It would appear that Alberta availed herself more of this aid.

III. RECOMMENDATIONS

For Vocational Education in Saskatchewan

On the basis of the findings and conclusions of this study, the following recommendations are made as possible courses of action for improving vocational education in Saskatchewan. (The recommendations

¹Quik Canadian Facts (Toronto: The Canadian Pocket Encyclopedia, 1967), p. 48.

are not given in order of importance.)

1. A more extensive and a more practical teacher training program should be implemented.

The questionnaire study revealed that many vocational education instructors were inadequately qualified. With more schools expanding and adopting the Division IV program the staff problem would become more acute. A teacher training program that would give teachers the necessary educational and practical background requires immediate attention. A program of public relations and "selling" is required to encourage those people with necessary skills to enter teacher training institutions.

2. A plan of centralization to provide the necessary enrollment for the courses outlined in the Division IV curriculum.

It is impractical to think about adopting the new Division IV program into the present school organization. Very few centres have the necessary enrollment and facilities. Before the facilities could be provided some plan would have to be adopted to get together a larger enrollment to warrant the required expenditure.

3. A definite plan of articulation is needed, in order to make the study of the courses more meaningful and more rewarding.

Students like to see some plan in the studies they are following. The plan must provide some continuity in the courses that the students have chosen. A course that was started in high school should be counted as a credit at a technical institute, the apprenticeship program or other post high school training institutions. Such a plan would add meaning and incentive to students doing high school work.

4. Entrance requirements to the university and the technical institute should be revised so that vocational subjects would be accepted as credit.

The questionnaire study revealed that students were forced to follow matriculation courses because of university requirements, even if they lacked ability to enter university. If the university accepted vocational subjects as credits, students could use these rather than some academic subjects which they could not handle or in which they were not interested. The study further revealed that the entrance requirements to the technical institute were quite stringent. It was difficult to enroll at the institutes unless you had a high academic standing. The technical institutes should be made available to more students.

5. A more definite and practical philosophy regarding general education and vocational education should be adopted and made known to people concerned.

Many of the respondents to the questionnaire study appeared to be uncertain as to what the difference between the two terms was. There were some who interpreted the program as being one thing and others who believed it to mean another. There should be clarity of purpose and direction so that the greatest benefit would come from a given course. Many teachers also appeared to be uncertain as to the policy regarding the adoption of the new Division IV curriculum. More information and directives are required in order to keep all personnel informed.

6. Instructors have to be given wider scope in the teaching of the courses.

Generally speaking, vocational education courses have wide ability groups which require a different approach. This cannot be done if regulations call for a certain amount of work to be covered. A teacher who has the required freedom can adapt the program to individual differences. The instructor can make a program more practical or more theoretical depending on the ability and future plans of the students.

7. A wider variety of courses should be offered in some of the sections of vocational education at the high school level.

Several courses such as pipe trades, appliance servicing, could be added to the technical vocational courses. There should be some provision made for courses in home economics in which boys could enroll. Provision should be made in the new course to offer some subjects as part of general education rather than job training.

8. A sound guidance program is required to give students more help in planning their careers and explaining vocational education programs to them.

There is a lack of well-trained, full-time guidance counsellors in each school or in each area, to perform the necessary duties. An adequate guidance program in the schools would perform a great service to students who require the help and advice in selecting courses from which they would gain the most benefit and personal satisfaction.

9. Provision should be made for a more extensive informative program to bring about a change in attitude toward vocational education by making the public aware of the purposes and advantages of the program.

Many people looked upon vocational education as a "second-rate" education. Lower ability students were often pressured into academic courses because these courses had a higher status. These students became discouraged and dropped out of school because they were unable to cope with the work. A change in attitude would help to "save" these students.

For Further Research

This study has revealed the following problems which are suggested for further research.

1. A study could be made in about three or four years time to determine the effectiveness of the Division IV program.
2. A study could be made to determine what the people, who employ the graduates from vocational education courses, suggest should be offered in these courses at school.
3. A planned research to be undertaken by organizations connected with education, or by individuals, to determine current and future trends and needs of the economy so that vocational education could be adapted to changing conditions.
4. A study could be made to determine criteria for development of province-wide programs and for evaluation of the program.

The findings of this study pointed out the shortcomings of the Saskatchewan vocational education program. These shortcomings suggested certain courses of action. Recommendations for improving the program were based on the shortcomings. The study also revealed the need for further research in several areas in order to formulate a program that

would be most useful and to evaluate it. Further research would add to the limited body of knowledge that we have in this field. The changing nature of society today demands constant research and adaptation to endeavor to provide in our schools the necessary education.

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APPENDIX

(Letter to the Superintendents)

43 MacKenzie Crescent
Saskatoon, Saskatchewan
October 21, 1968

Dear Sir:

I am making an assessment of the high school vocational education program in the province, as part of my research for my Master's thesis. I intend to send a questionnaire to each vocational education teacher in two high schools of each unit and city system. The purpose of this questionnaire is to secure information in this field and to get teacher reaction and assessment of the present vocational education program.

My hope is that the superintendents of the province would supply me with names of principals of two such high schools in their respective areas. I respectfully request your help in this project by supplying me with two principals' names and addresses in your area. It would be most helpful to have schools named which have shopwork, home economics, commercial (business education), and vocational agriculture taught in them or at least most of these subject areas. I require 100% returns of the questionnaire, therefore, would you name schools which would be most willing to participate in this project.

In the preliminary arrangements, I have contacted and received approval for the project from Mr. C. D. Peters, Chief Superintendent of Schools. I am sure that I can count on the same support and cooperation from each superintendent in the province.

May I add also, that the information received in the replies both from you and the teachers, will be held in strictest confidence. The identity of teachers and schools will not be revealed.

May I thank you in advance for your help in the educational project. The help and an early reply will be most appreciated.

Respectfully yours,

S. M. Klopoushak

/hdg

43 MacKenzie Crescent,
Saskatoon, Saskatchewan,
November 14, 1968.

To the Principal

Dear Sir:

The enclosed questionnaire is part of my research for my Master's thesis. I have consulted with your superintendent and received from him information and permission to conduct the survey. The support received from the superintendents was very encouraging and I am sure the schools will react just as favorably.

Knowing the work of a principal, I realize that you are called upon many times to give of your time for various projects. I hope you will find time to participate in this survey. To lessen your load a bit, may I suggest that you choose a staff member to handle the mechanics of the questionnaires, that is, hand them out, collect them and drop them in the mail. Naturally, this would be up to you.

This envelope contains questionnaires to the different teachers of vocational education and to the principal. To schools where it is not known which vocational subjects are taught, I am sending all parts of the questionnaire, namely, questionnaires for the principal, shop teacher, home economics teacher, commercial teacher, and the vocational agriculture teacher.

Although the questionnaire appears lengthy, an attempt was made to construct it in such a way so that many questions could be filled out with a check mark. There are a few longer questions which give teachers an opportunity to express their opinions. These are kept to a minimum.

I feel very strongly that vocational education is one area that requires a great deal of research and study. I trust that you will be able to participate and contribute to a very timely and necessary study. I will try to make available to you a summary of the results of this study when it is completed.

I have timed the mailing of the questionnaire so that you could have it completed well before the rush of the Christmas season. It would be greatly appreciated if it were returned to me by the end of November.

Would you convey my sincere thanks to everyone in your school who helped in any way to have this survey completed and returned.

Gratefully yours,

S. M. Klopoushak

QUESTIONNAIRE

THE DEVELOPMENT OF VOCATIONAL EDUCATION IN THE PROVINCE OF
SASKATCHEWAN FROM 1950 to 1967INTRODUCTION

- I. The purpose of this questionnaire is to investigate the area of vocational education in the high school in the province of Saskatchewan. It is intended to examine the kinds of programs that are in existence, to determine how effective and adequate they are, the kinds of students who participate in the program, the staffing of schools, and the adequacy of the facilities.
- II. Please answer the following questions as frankly and accurately as possible. You are assured that the replies will be held in strictest confidence. The identity of teachers and schools will not be revealed.
- III. When you have completed all items, please seal the questionnaire in the enclosed envelope and return it to the principal or staff member in charge. He will then return these to S. M. Klopoushak, 43 MacKenzie Crescent, Saskatoon, Sask.

PRINCIPAL'S QUESTIONNAIRE

A. BACKGROUND INFORMATION

1. What kind of school do you have?
☐ (1) Collegiate - Grades 9 to 12.
☐ (2) Composite High School - Grades 9 to 12.
☐ (3) Combined Junior and Senior High School.
☐ (4) Other--please specify _____

2. How many years experience as a principal do you have?
☐ years in this school.
☐ years elsewhere.

3. What subjects are taught in your school? (Please check the appropriate subjects from the list)

<input type="checkbox"/> English	<input type="checkbox"/> Science	<input type="checkbox"/> Latin
<input type="checkbox"/> Social Studies	<input type="checkbox"/> Chemistry	<input type="checkbox"/> Commercial
<input type="checkbox"/> Mathematics	<input type="checkbox"/> Physics	<input type="checkbox"/> Shopwork
<input type="checkbox"/> Algebra	<input type="checkbox"/> Biology	<input type="checkbox"/> Vocational
		<input type="checkbox"/> Agriculture
<input type="checkbox"/> Geometry	<input type="checkbox"/> French	<input type="checkbox"/> Home Economics

 Other: _____

4. What is the enrolment in your school in the grades below?

	Boys	Girls
Grade VII	_____	_____
Grade VIII	_____	_____
Grade IX	_____	_____
Grade X	_____	_____
Grade XI	_____	_____
Grade XII	_____	_____

5. What is your sex?
☐ (1) Male
☐ (2) Female

B. In this section you are asked to express your judgment of the Vocational Education situation as you see it in your school. For each question please check the statement or fill in the answer that most closely represents your opinion or describes your situation.

1. Do you think sufficient time is allotted to the teaching of vocational education?
☐ (1) Adequate time.
☐ (2) Insufficient time.

2. Do you think the vocational education courses followed in your school give students adequate background to continue in their chosen field?
- ____ (1) Yes
____ (2) No. Why not? _____
3. Do you think the facilities in your school are adequate to carry out the vocational education program as outlined in the 1957 curriculum guide?
- ____ (1) Yes.
____ (2) No. Why not? _____
4. Do you think the facilities in your school are adequate to carry out the vocational education program as outlined in Division IV, 1967 curriculum?
- ____ (1) Yes.
____ (2) No. Why not? _____
5. In your opinion, what is the greatest drawback in the teaching of vocational education in your school? (You may check more than one)
- ____ (1) Lack of facilities
____ (2) Lack of qualified staff
____ (3) Other--please specify. _____
6. Do you think it will be possible to bring in the new Division IV curriculum in Technical and Vocational Education, 1967, into your present school set-up?
- ____ (1) Yes.
____ (2) No. Why not? _____
7. In your opinion, what would be the best school organization for offering an adequate vocational education program throughout the Province of Saskatchewan?
- ____ (1) Present Larger Unit organization with its Composite High Schools
____ (2) Larger Regional Technical Schools (several throughout the province)
____ (3) Comprehensive Schools
____ (4) Other--please specify _____
8. In your opinion, what could be done to improve the vocational education courses in your school?
- _____

9. Is qualified staff readily available for the vocational education purposes in your school?

	Yes	No
Shopwork	_____	_____
Home Economics	_____	_____
Business Education	_____	_____
Vocational Agriculture	_____	_____

10. What problems do you encounter in obtaining staff?

-
11. Make any other comments you wish as an assessment of the vocational education program.
-

SHOPWORK (The term "shopwork" is used here to mean all phases of vocational and technical education, including classroom teaching of relevant theory.)

A. In each of the following items please check the one response (or fill in the answer) which most adequately describes your situation.

1. How many years of experience have you had in the teaching of shopwork?

_____ years.

2. What training beyond grade XII, do you have for teaching shopwork?

_____ (1) Several classes in vocational education.--state number _____

_____ (2) Professional "B" certificate.

_____ (3) Degree in vocational education (name University)

_____ (4) Journeyman's papers in a field of vocational education.

_____ (5) Other--please specify _____

3. What percentage of the time do you spend in teaching shopwork in your school?

_____ (1) 100%

_____ (2) 75 - 99%

_____ (3) 50 - 74%

_____ (4) 25 - 49%

_____ (5) below 25%

4. What grades are taught shopwork in your school?

_____ (1) Grade VII

_____ (2) Grade VIII

_____ (3) Grade IX

_____ (4) Grade X

_____ (5) Grade XI

_____ (6) Grade XII

5. What program or course of study do you follow in each grade?

Grade VII _____ (1) Adaptation of Division III Curriculum.

_____ (2) Your own curriculum.

_____ (3) Other--please specify _____

Grade VIII _____ (1) Division III Curriculum Guide.

_____ (2) Your own Curriculum

_____ (3) Other--please specify _____

- Grade IX _____ (1) Division III Curriculum Guide.
 _____ (2) A Guide to Technical and Vocational Courses,
 Bulletin D, 1957.
 _____ (3) Your own Curriculum.
 _____ (4) Other--please specify _____
- Grade X _____ (1) A Guide to Technical and Vocational Courses,
 Bulletin D, 1957.
 _____ (2) Division IV Technical Vocational Curriculum,
 1967.
 _____ (3) Other--please specify _____
- Grade XI _____ (1) A Guide to Technical and Vocational Courses,
 Bulletin D, 1957.
 _____ (2) Division IV Technical Vocational Curriculum,
 1967.
 _____ (3) Other--please specify _____
- Grade XII _____ (1) A Guide to Technical and Vocational Courses,
 Bulletin D, 1957.
 _____ (2) Division IV Technical Vocational Curriculum,
 1967.
 _____ (3) Other--please specify _____

6. Is shopwork compulsory in any of the grades in your school?
 (check the appropriate ones)

				If compulsory, name the subjects that are compulsory in each grade.
Grade VII	_____	Yes _____	No _____	_____
Grade VIII	_____	Yes _____	No _____	_____
Grade IX	_____	Yes _____	No _____	_____
Grade X	_____	Yes _____	No _____	_____
Grade XI	_____	Yes _____	No _____	_____
Grade XII	_____	Yes _____	No _____	_____

7. What is the enrolment in the different courses as outlined in A Guide to Technical and Vocational Courses, Bulletin D, 1957?

Drafting I	_____	Motor Mechanics I	_____
Drafting II	_____	Motor Mechanics II	_____
Drafting III	_____	Motor Mechanics III	_____
Woodwork I	_____	Electricity I	_____
Woodwork II	_____	Electricity II	_____
Woodwork III	_____	Electricity III	_____
Metalwork I	_____	Welding I	_____
Metalwork II	_____	Welding II	_____
Metalwork III	_____	Other (specify)	_____

8. If the Division IV Technical Vocational Curriculum, 1967, is followed, what is the enrolment in the different courses?

	Grade X	Grade XI	Grade XII
Mechanical Field	_____	_____	_____
Construction Field	_____	_____	_____
Electrical-Electronics	_____	_____	_____
Drafting Trade	_____	_____	_____
Other	_____	_____	_____

9. How many credits in vocational and technical subjects (shopwork) can a student earn in each grade in your school? (Write the number of credits opposite each grade).

Grade VII	_____
Grade VIII	_____
Grade IX	_____
Grade X	_____
Grade XI	_____
Grade XII	_____

10. What kind of student enrolls in shopwork?

_____ above average
 _____ average
 _____ below average

11. What percentage of the students enrol in the shopwork courses for the reasons below. (State approximate percent in the blank)

_____ (1) Credit for matriculation course.
 _____ (2) Basis for entry into Technical Institute and further training.
 _____ (3) Training for entry into employment.
 _____ (4) Other--please specify _____

- B. In this section you are asked to express your judgment on the shopwork situation as you see it. For each question check the one statement that most closely represents your opinion.

1. Do you think sufficient time is allotted to the teaching of shopwork?

_____ (1) Adequate time.
 _____ (2) Insufficient time.

2. Do you think the shopwork curriculum that is followed in your school gives students adequate background to continue in their chosen field?

____ (1) Yes.
 ____ (2) No. Why or why not? _____

3. In your opinion, what is the status of facilities in your school?

____ (1) Adequate facilities for all shop courses.
 ____ (2) Sufficient for basic shop only.
 ____ (3) Not as good as you really need.

4. In your opinion, what can be done to improve the shopwork program in your school? (You may check more than one.)

____ (1) Extend facilities.
 ____ (2) Procure better qualified staff.
 ____ (3) Improve content and offer more extensive courses.
 ____ (4) Other--please specify _____

5. In your opinion, what should be the best school organization for offering an adequate shopwork program throughout the province?

____ (1) Present larger Unit organization with its Composite High Schools.
 ____ (2) Larger Regional Technical Schools (Several throughout the province).
 ____ (3) Comprehensive schools.
 ____ (4) Other--please specify kind _____

The remaining questions ask you to express yourself generally on the vocational education program in the province.

6. Do you think it will be possible to bring in the new Division IV Technical Vocational Curriculum in the different technologies into the present school organization?

____ (1) Yes.
 ____ (2) No. Why not. _____

7. If the answer to No. 6 is "No", what do you think would have to be done so that the new Division IV Technical Vocational Curriculum could be fully instituted in your school?
- _____

8. Make any other comments you wish as an assessment of the vocational education program.
- _____

HOME ECONOMICS

A. In each of the following items check the one response (or fill in the answer) which most adequately describes your situation.

1. How many years of experience have you had in the teaching of home economics at the high school level?

_____ years.

2. What training have you had in teaching home economics?

_____ (1) degree in home economics.

_____ (2) 5 - 10 classes in home economics at a university.

_____ (3) below 5 classes in home economics at a university.

_____ (4) other--please specify _____

3. What percentage of the time do you spend in teaching home economics in your school?

_____ (1) 100%

_____ (2) 75 - 99%

_____ (3) 50 - 74%

_____ (4) 25 - 49%

_____ (5) below 25%

4. What grades are taught home economics in your school?

_____ (1) Grade VII

_____ (2) Grade VIII

_____ (3) Grade IX

_____ (4) Grade X

_____ (5) Grade XI

_____ (6) Grade XII

5. What program or course do you follow in each grade?

Grade VII _____ (1) Adaptation of Division III Curriculum.

_____ (2) Your own curriculum.

_____ (3) Other--please specify _____

Grade VIII _____ (1) Division III Curriculum Guide.

_____ (2) Your own curriculum.

_____ (3) Other--please specify _____

Grade IX _____ (1) Division III Curriculum Guide.

_____ (2) A Guide to Technical and Vocational Courses, Bulletin D, 1957.

_____ (3) Your own curriculum.

_____ (4) Other--please specify _____

Grade X _____ (1) A Guide to Technical and Vocational Courses,
Bulletin D, 1957.

_____ (2) Home Ec. 10 - Management for Living
(Tentative) July, 1968.

_____ (3) Other--please specify.

Grade XI _____ (1) Guide to Technical and Vocational Courses,
Bulletin D, 1957.
_____ (2) Your own curriculum.
_____ (3) Other--please specify

Grade XII _____ (1) Guide to Technical and Vocational Courses,
Bulletin D, 1957.
_____ (2) Your own curriculum.
_____ (3) Other--please specify _____

6. Is home economics compulsory in any of the grades? (please check)

Grade VII	_____	Yes	_____	No
Grade VIII	_____	Yes	_____	No
Grade IX	_____	Yes	_____	No
Grade X	_____	Yes	_____	No
Grade XI	_____	Yes	_____	No
Grade XII	_____	Yes	_____	No

7. How many credits can a student earn in each grade in your school?
(State number)

Grade VII	_____
Grade VIII	_____
Grade IX	_____
Grade X	_____
Grade XI	_____
Grade XII	_____

8. What is the enrolment in home economics in each grade?

Grade VII _____
Grade VIII _____
Grade IX _____
Grade X _____
Grade XI _____
Grade XII _____

9. What kind of student enrolls in home economics?

_____ above average
_____ average
_____ below average

10. Approximately what percentage of the students enrol in the home economics courses for the reasons below? (State the percent in the blank.)

_____ (1) Credit for matriculation course.
 _____ (2) Basis for entry into Technical Institutes and further training.
 _____ (3) Training for entry into employment.
 _____ (4) Other--please specify _____

- B. In this section you are asked to express your opinion of the home economics situation as you see it. For some questions check the statement that most closely represents your impression. In other questions you will have a chance to express yourself freely on the home economics program.

1. Do you think there is sufficient time allotted to the teaching of home economics in the curriculum guide?

_____ (1) Adequate time.
 _____ (2) Insufficient time.

2. Do you think the home economics courses as outlined in A Guide to Technical and Vocational Courses, Bulletin D, 1957, give students adequate background to continue in their chosen field?

_____ (1) Yes.
 _____ (2) No. Why or why not? _____

3. Do you think the facilities in your school are adequate to carry out the program suggested in the 1957 curriculum guide?

_____ (1) Adequate facilities for all home economics courses.
 _____ (2) Sufficient for basic home economics only.
 _____ (3) Not as good as we need.

4. In your opinion, what could be done to improve the home economics course in your school? (You may check more than one).

_____ (1) Extend facilities.
 _____ (2) Procure better qualified staff.
 _____ (3) Improve content and offer more extensive courses.
 _____ (4) Other--please specify _____

5. In your opinion, what would be the best school organization for offering an adequate home economics program throughout the province?

_____ (1) Present Larger Unit Organization with its Composite High Schools.

_____ (2) Larger Regional Schools (several for the province).

_____ (3) Comprehensive schools.

_____ (4) Other--please specify _____

6. Do you think it will be possible to bring in the new Division IV Technical Vocational Curriculum as presently foreseen in the field of home economics into your present school set-up?

_____ (1) Yes.

_____ (2) No. Why not? _____

7. If the answer to No. 6 is "No", what do you think would have to be done in order to institute the full Division IV vocational education program in home economics?

8. Make any other comments you wish as an assessment of the home economics program as it exists.

BUSINESS EDUCATION (COMMERCIAL)

A. In each of the following items please check the one response (or fill in the answer) which most adequately describes your situation.

1. How many years of experience have you had in the teaching of commercial subjects at the high school level?

_____ years

2. What training have you had for teaching commercial?

_____ (1) Professional certificate.
 _____ (2) B.Ed. with Commerce major.
 _____ (3) Business course in a Business College plus university.
 _____ (4) Other--please specify _____

3. What percentage of the time do you spend in teaching commercial subjects in your school?

_____ (1) 100%
 _____ (2) 75 - 99%
 _____ (3) 50 - 74%
 _____ (4) 25 - 49%
 _____ (5) below 25%

4. What grades are taught the commercial subjects in your school?

_____ (1) Grade VII	_____ (4) Grade X
_____ (2) Grade VIII	_____ (5) Grade XI
_____ (3) Grade IX	_____ (6) Grade XII

5. What program or course do you follow in each grade?

Grade VII (specify course) _____

Grade VIII (specify course) _____

Grade IX _____ (1) A Guide to Technical and Vocational Courses, Bulletin D, 1957.
 _____ (2) Other--please specify _____

Grade X _____ (1) A Guide to Technical and Vocational Courses, Bulletin D, 1957.
 _____ (2) Division IV Curriculum Guide for Business Education, 1967
 _____ (3) Other--please specify _____

Grade XI _____ (1) A Guide to Technical and Vocational Courses,
Bulletin D, 1957.
_____ (2) Division IV Curriculum Guide for Business
Education, 1967.
_____ (3) Other--please specify _____

Grade XII _____ (1) A Guide to Technical and Vocational Courses,
Bulletin D, 1957.
_____ (2) Division IV Curriculum Guide for Business
Education, 1967.
_____ (3) Other--please specify _____

6. How many credits in commercial can a student earn in each grade in your school?

Grade VII _____
Grade VIII _____
Grade IX _____

Grade X _____
Grade XI _____
Grade XII _____

7. How many students take commercial subjects in each of the grades? If any of the subjects are compulsory, please circle them.

Grade IX - Business Essentials _____ Typewriting _____
Grade X - Recordkeeping _____ Typewriting _____ Shorthand _____
Grade XI - Bookkeeping _____ Typewriting _____ Shorthand _____
Grade XII - Bookkeeping _____ Typewriting _____ Shorthand _____
Special One-Year Commercial Course _____

8. If you are following the courses outlined in Division IV Curriculum Guide for Business Education, 1967, name the course and enrolment for each course offered in your school.

Course	Grade	Enrolment
_____	_____	_____

9. What kind of student enrolls in the Commercial course?

_____ (1) Above average.
_____ (2) Average.
_____ (3) Below average.

- B. In this section you are asked to express your opinion of the Commercial program as you see it. For each question check the statement or write your comment that most closely represents your position.

1. Do you think there is sufficient time allotted to the teaching of commercial in the curriculum guide?

_____ (1) Adequate time.
_____ (2) Insufficient time.

2. Do you think the commercial curriculum that is followed in your school gives students adequate background to continue in their chosen field?
- ____ (1) Yes.
____ (2) No. Why or why not? _____
3. Do you think the facilities in your school are adequate to carry out the commercial program suggested in the 1957 curriculum guide?
- ____ (1) Yes.
____ (2) No. Why not? _____
4. Do you think the facilities in your school are adequate to carry on the program suggested in the Division IV, 1967 curriculum?
- ____ (1) Yes.
____ (2) No. Why not? _____
5. In your opinion, what would be the best school organization for offering an adequate business education program throughout the province?
- ____ (1) Present Larger Unit organization with its Composite High Schools.
____ (2) Larger Regional Technical Schools (possibly 10 for the province).
____ (3) Comprehensive schools.
____ (4) Other--please specify _____
6. Do you think it will be possible to bring in the new Division IV Curriculum in Business Education, 1967, into your present school set-up?
- ____ (1) Yes.
____ (2) No. Why not? _____
7. If the answer to No. 6 is "No," what do you think would have to be done in order to institute the full Division IV vocational education program in business education?
- _____
8. Make any other comments you wish as an assessment of the commercial program as it exists.
- _____

VOCATIONAL AGRICULTURE

In each of the following items please check the one response (or fill in the answer) which most adequately describes your position.

1. How many years of experience have you had in the teaching of vocational agriculture?

_____ years.

2. What training, after Grade XII, have you had for teaching vocational agriculture?

- _____ (1) No special training, just regular teaching certificate.
 _____ (2) Farming experience plus a teaching certificate.
 _____ (3) Degree in Agriculture (name university) _____
 _____ (4) University short course in agriculture plus a teaching certificate.
 _____ (5) Other--please specify. _____

3. What grades are taught vocational agriculture in your school?

- _____ (1) Grade IX
 _____ (2) Grade X
 _____ (3) Grade XI
 _____ (4) Grade XII

4. What percentage of the time do you spend in teaching vocational agriculture in your school?

- _____ 100%
 _____ 75%
 _____ 50%
 _____ 25%
 _____ below 25%

5. What program or course of study do you follow in your school? (name it)

6. What is the enrolment and the number of credits a student can earn (in each grade) in vocational agriculture in your school?

	Enrolment	Credits
Grade IX	_____	_____
Grade X	_____	_____
Grade XI	_____	_____
Grade XII	_____	_____

7. What percentage of the students enrol in vocational agriculture for the reasons below. (State percent in the blank)
- ____ (1) Credit for matriculation course.
____ (2) Basis for further training.
____ (3) Training for farming.
____ (4) Other--please specify _____
8. In your opinion, is the vocational agriculture course providing adequate background for students interested in agriculture?
- ____ (1) Yes.
____ (2) No. Why not? _____
9. In your opinion, what can be done to improve the vocational agriculture program in your school?
- _____
10. What do you think is the greatest drawback(s) in the teaching of vocational agriculture?
- _____
11. Other comments which you deem applicable on vocational agriculture:
- _____

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